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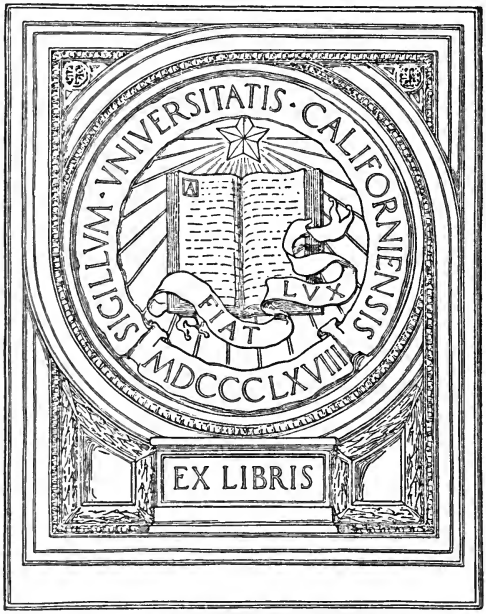

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Examples of Private Gold Coins in Circulation between 1830 and 1860.

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MONEY AND BANKING

ILLUSTRATED BY AMERICAN HISTORY

REVISED AND CONTINUED TO THE YEAR 1911

BY

HORACE WHITE

FOURTH EDITION

GINN AND COMPANY
BOSTON · NEW YORK · CHICAGO · LONDON

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PREFACE TO THE FOURTH EDITION

During the past three years a marked change in public sentiment regarding the money question has forced its way into the national councils. In the act of May 30, 1908, the two houses of Congress, for the first time since the Civil War, agreed that a bond-secured currency was not the only kind of bank paper fit to circulate in the community. Although no bank notes have been issued under the act, authority exists to issue them on the security of commercial paper owned by the banks and retained by themselves in associations formed for the purpose.

The preconceptions of the past having been shaken, other steps followed. A National Monetary Commission was formed, which has collected and published a mass of facts, of legislation, and of historical and general information on the subject of banking far exceeding in magnitude anything ever brought together heretofore in the world's history. Most, if not all, of this compilation is well worth its cost, for although no person can be expected to read the whole of it, all who are qualified to take part in the discussion, and in the work of framing monetary legislation, can readily find in it what they need.

Another indication of the drift of opinion is found in the act of Congress providing for the issue of bonds for the construction of the Panama canal, which are not available for security for national-bank circulation. These are the first bonds so issued since the national banking law was passed.

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It implies that the government now looks to the end of a bond-secured currency.

What is to take its place has not yet been decided. The chairman of the National Monetary Commission has outlined a plan for a Reserve Association of America, with a capital of $300,000,000, which shall be the fiscal agent of the government and be owned by the national banks participating in proportion to their capital, — their shares not to be transferable. The full text of this plan is printed as an appendix to this volume, and an analysis of it is given in Chapter XXI. The American Bankers' Association has given a favorable reception to the plan through its Executive Council. Altogether there is now a fair prospect of legislation in some form which shall give us a flexible currency redeemable at all times in gold, and a loan market for commercial paper of standard grade which shall be available at a rate of discount uniform in all parts of the country where participating banks exist.

H. W.

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MONEY AND BANKING

BOOK I

EVOLUTION OF MONEY

CHAPTER I

MONEY A COMMODITY

MONEY is a commodity which mankind voluntarily accepts in exchange for all other commodities and services.

We are now speaking of *real money*, not of *promises to pay money*. All of our paper circulating medium and all of our smaller coins are, either directly or indirectly, promises to pay money. In the case of the former the promise is stamped on it. In the case of the latter it is merely expressed in the laws. The difference between real money and a promise to pay money is the same as that between a meal and a meal ticket, or between a trunk and a trunk check.

Difference between Money and Promises to pay.

A commodity which is universally accepted as a medium of exchange naturally becomes a *standard of value*, by being continually brought into comparison with other commodities.

Aristotle gives us the following definition of money and account of its origin:

It is plain that in the first society (that is, in the household) there was no such thing as barter, but that it took place when the

community became enlarged: for the former had all things in common, while the latter, being separated, must exchange with each other according to their needs, just as many barbarous tribes now subsist by barter; for these merely exchange one useful thing for another, as, for example, giving and receiving wine for grain and other things in like manner. This kind of trading is not contrary to nature, nor does it resemble a gainful occupation, being merely the complement of one's natural independence. From this, nevertheless, it came about logically that as the machinery for bringing in what was wanted, and of sending out a surplus, was inconvenient, the use of money was devised as a matter of necessity. For not all the necessaries of life are easy of carriage; wherefore, to effect their exchanges, men contrived something to give and take among themselves, which, being valuable in itself, had the advantage of being easily passed from hand to hand for the needs of life —such as iron or silver or something else of that kind, of which they first determined merely the size and weight, but eventually put a stamp on it in order to save the trouble of weighing, for the stamp was placed there as the sign of its value.[1]

Aristotle on the Origin of Money.

Among the things used as money by various people within the historical period are cacao beans, salt, silk, furs, tobacco, dried fish, wheat, rice, olive oil, cocoanut oil, cotton cloth, cowry shells, iron, copper, platinum, nickel, silver, and gold. It would be difficult to say what had not been used as money at some time or place. Our own history furnishes an abundance of curious examples, the most instructive being the tobacco currency of the colonial period. It may be said that Virginia grew her own money for nearly two centuries, and Maryland for a century and a half.

Various Kinds of Money.

The first settlers of New England found wampumpeage, sometimes called wampum and sometimes peage, in use among the aborigines as an article of adornment and a medium of exchange. It consisted of beads made from

[1] *Politics*, I, 9.

the inner whorls of certain shells found in sea water. The beads were polished and strung together in belts or sashes. They were of two colors, black and white, the black being double the value of the white. The early settlers of New England, finding that the fur trade with the Indians could be carried on with wampum, easily fell into the habit of using it as money. It was practically redeemable in beaver skins, which were in constant demand in Europe. The unit of wampum money was the fathom, consisting of 360 white beads worth sixty pence the fathom. In 1648 Connecticut decreed that wampum should be "strung suitably and not small and great vncomely and disorderly mixt as formerly it hath been." Four white beads passed as the equivalent of a penny in Connecticut, although six were usually required in Massachusetts and sometimes eight. In the latter colony wampum was at first made legally receivable for debts to the amount of 12*d.* only. In 1641 the limit was raised to £10, but only for two years. It was then reduced to 40*s.* It was not receivable for taxes in Massachusetts. The use of wampum money extended southward as far as Virginia.

Wampum and Beaver.

The decline of the beaver trade brought wampum money into disrepute. When it ceased to be exchangeable in large sums for an article of international trade the basis of its value was gone. Moreover it was extensively counterfeited, and the white beads were turned into the more valuable black ones by dyeing. Nevertheless it lingered in the currency of the colonies as small change till the early years of the eighteenth century. While it was in use it fluctuated greatly in value.

Disappearance of Wampum.

The first General Assembly of Virginia met at Jamestown July 31, 1619, and the first law passed was one fixing the price of tobacco "at three shillings the beste, and the

second sorte at 18*d.* the pounde." Tobacco was already the local currency. In 1642 an act was passed forbidding the making of contracts payable in money, thus virtually making tobacco the sole currency.[1]

Tobacco Money in Virginia.

The act of 1642 was repealed in 1656, but nearly all the trading in the province continued to be done with tobacco as the medium of exchange.

In 1628 the price of tobacco in silver had been 3*s.* 6*d.* per pound in Virginia. The cultivation increased so rapidly that in 1631 the price had fallen to 6*d.* In order to raise the price, steps were taken to restrict the amount grown and to improve the quality. The right to cultivate tobacco was restricted to 1500 plants per poll. Carpenters and other mechanics were not allowed to plant tobacco "or do any other work in the ground." These measures were ineffective. The price continued to fall. In 1639 it was only 3*d.* It was now enacted that half of the good and all of the bad should be destroyed, and that thereafter all creditors should accept 40 lb. for 100; that the crop of 1640 should not be sold for less than 12*d.*, nor that in 1641 for less than 2*s.* per pound, under penalty of forfeiture of the whole crop. This law was ineffectual, as the previous ones had been, but it caused much injustice between debtors and creditors by impairing the obligation of existing contracts. In 1645 tobacco was worth only 1½*d.* and in 1665 only 1*d.* per pound.

Rapid Decline in Price.

These events teach us that a commodity which is liable to great and sudden changes of supply is not a desirable one to be used as money.

In the year 1666 a treaty was negotiated and ratified between the colonies of Maryland, Virginia, and Carolina, to stop planting tobacco for one year in order to raise the

[1] Hening, I, 262.

price. This temporary suspension of planting made necessary some other mode of paying debts. It was accordingly enacted that both public dues and private debts falling due "in the vacant year from planting" might be paid in country produce at specified rates.

Tobacco Riots in 1683.

In 1683 an extraordinary series of occurrences grew out of the low price of tobacco. Many people signed petitions for a cessation of planting for one year for the purpose of increasing the price. As the request was not granted, they banded themselves together and went through the country destroying tobacco plants wherever found. The evil reached such proportions that in April, 1684, the Assembly passed a law declaring that these malefactors had passed beyond the bounds of riot, and that their aim was the subversion of the government. It was enacted that if any persons, to the number of eight or more, should go about destroying tobacco plants, they should be adjudged traitors and suffer death.

Tobacco Paper Currency.

In 1727 tobacco notes were legalized. These were in the nature of certificates of deposit in government warehouses issued by official inspectors. They were declared by law current and payable for all tobacco debts within the warehouse district where they were issued. They supply an early example of the distinction between money on the one hand, and government notes, or bank notes, on the other. The tobacco in the warehouses was the real medium of exchange. The tobacco notes were orders payable to bearer for the delivery of this money. They were redeemable in tobacco of a particular grade, but not in any specified lots. Counterfeiting the notes was made a felony. In 1734 another variety of currency, called "crop notes," was introduced. These were issued for particular casks of tobacco,

each cask being branded and the marks specified on the notes.

The circulating medium of the New England colonies was quite as fantastic as that of Virginia. Merchantable beaver was legally receivable for debts at 10*s.* per pound. In 1631 the General Court of Massachusetts ordered that corn should pass for payment of all debts at the price it was usually sold for, unless money or beaver skins were expressly stipulated. In other words, a debt payable in pounds, shillings, and pence might be paid at the debtor's option in any one of three ways: in corn at the market price, in beaver at 10*s.* per pound, or in the metallic money of England. For more than half a century this order continued in force and operation, other things being added to the list from time to time.

Early Massachusetts Currency.

In 1635 musket balls were made receivable to the extent of 12*d.* in one payment.

In 1640 Indian corn was made current at 4*s.* per bushel, wheat at 6*s.*, rye and barley at 5*s.*, and peas at 6*s.* Dried fish was added to the list. Taxes might be paid in these articles and also in cattle, the latter to be appraised.

The need of metallic currency was severely felt. In 1654 it was ordered that no coin should be exported, except 20*s.* to pay each one's traveling expenses, on penalty of forfeiture of the offender's whole estate.

The cost of carrying the country produce taken for taxes amounted to 10 per cent of the collections. A constable once collected 130 bushels of peas as taxes in Springfield. He found that he could transport this portion of the public revenue most cheaply by boat. Launching it on the Connecticut River, he shipped so much water on board at the falls that the peas were all spoiled. Thus we learn that money ought to be easy of carriage and not liable to injury by exposure to the elements.

In 1670 it was ordered for the first time that contracts made in silver should be paid in silver.

In 1675, during King Philip's war, the need of metallic money for public use was so great that a deduction of 50 per cent was offered on all taxes so paid.

The first local currency of New Netherland was wampum, but it was subordinate to the silver coinage of the mother country; that is, it was reckoned in terms of that coinage as fixed by the Dutch West India Company from time to time. It was first fixed at six white beads for a stiver. Wampum was not made in the province, but was imported from the east end of Long Island, the principal seat of production. It is mentioned in a letter from the Patroons of New Netherlands to the States General in June, 1634, as "being in a manner the currency of the country with which the produce of the country is paid for," the produce of the country being furs.

Early New York Money.

Beaver soon became current here, as in New England, and for the same reason, its currency value being fixed by the company at 8 florins per skin. As 6 wampum beads were equal to 1 stiver and 20 stivers to 1 florin, and 8 florins to 1 skin, the ratio of wampum to beaver was 960 to 1. The market ratio did not coincide with the legal ratio very long. Nor was the legal ratio of either wampum or beaver to silver maintained; for, in 1656, Director Stuyvesant wrote to the company urging that beaver be rated at 6 florins instead of 8, and wampum at 8 for a stiver instead of 6, as these rates were nearer the commercial values.

In 1719 the Assembly of South Carolina made rice receivable for taxes, "to be delivered in good barrels upon the bay in Charlestown." In the following year a tax of 1,200,000 lb. of rice was levied, and commissioners were appointed to issue rice orders to

Rice Currency.

public creditors, in anticipation of collection, at the rate of 30*s.* per 100 lb., in the following form:

"This order entitles the bearer to one hundred weight of well-cleaned merchantable rice to be paid to the commissioners that receive the tax on the second Tuesday in March, 1723."

Rice orders were made receivable for all purposes, and counterfeiting was made felony without benefit of clergy.

In eastern Tennessee and Kentucky, early in the nineteenth century, deer skins and raccoon skins were receivable for taxes and served the purposes of currency.

When California was first invaded by gold seekers there were a few Mexican coins in circulation there, not nearly sufficient to answer the needs of the growing community. The immigrants brought more or less metallic money with them. The smaller coins were those of many different countries, chiefly Spanish. For want of sufficient coins, the first trading was done largely with gold dust, sometimes by weighing it in scales, sometimes by guesswork. A "pinch" of gold dust about as large as a pinch of snuff had a current value and was a common measure in places where there was no means of weighing. At a public meeting in San Francisco, September 9, 1848, it was resolved by unanimous vote that $16 per ounce was a fair price for placer gold. This rate was at once adopted in all business transactions. By and by private coiners of gold came into the field. The Legislature was at first alarmed by the appearance of these unaccustomed pieces, and passed a law to prohibit their circulation and to close the shops where they were made. It was soon found, however, that they were a great convenience. Then the law was repealed. Several establishments immediately went to work assaying and coining gold. One of these was at Salt Lake City, whose productions were known as

Early California Devices.

Mormon coins. Only one of these establishments, that of Moffat & Co., of San Francisco, conformed exactly to the government standard of weight and fineness. All the others, however, including the Mormon ones, circulated freely, and were received on deposit by the banking houses until the government set up an assay office and began to stamp octagonal pieces of $50, called "slugs," and afterwards those of $20 each. This was done in 1851; the San Francisco mint was not ready till 1854. The Moffat coins continued to circulate after the mint had gone into operation, since everybody had confidence in their goodness. It is estimated that $50,000,000 of private coins were struck. They were received in the Atlantic cities at their assay value only.

Private Coins and "Slugs."

The foregoing illustrations drawn from our own history serve to explain the nature of money and the processes by which mankind learns to distinguish between good money and bad. Men discover the need of a common medium of exchange as soon as society emerges from the patriarchal state, where each group of persons is sufficient unto itself. They learn by experience that one who wants wheat, and has only skins to exchange for it, must meet somebody who has wheat and wants skins, and that much time and labor may be lost before the two can find each other. Then more time may be lost before they can agree upon the ratio at which the two articles should be exchanged for each other. The few and simple words with which Aristotle has treated this subject cannot be bettered. Whole tomes have been written to say the same things and have ended without saying them.

General Principles.

Money is always the product of labor. Nobody would give that which has cost him labor, in exchange for something which he could obtain without labor.

All the things that have been used as money have possessed value for other purposes, and this other value led to their use as money. Hence it may be said that the value of any standard money depends upon its utility for this and other purposes combined and is measured by the demand for those purposes. Gold would never have been brought into use as money if it had not possessed certain qualities of beauty, portability, durability, etc., which caused it to be prized as an article of adornment.

The Value of Gold.

All trade is barter, or the exchange of property and service for other property and service. This is true when wheat is exchanged for gold, and gold for cloth. Here are two acts of barter to accomplish one result, namely, the procuring of cloth for wheat. The word "barter" is commonly used to signify the exchange of property without the use of money. It must be borne in mind, however, that all trade is barter, even when the precious metals are employed as intermediaries — the latter being articles of barter also, and possessing the same value as the things for which they are exchanged. *The whole science of money hinges on this fact.*

All Trade is Barter.

Objections to tobacco money in Virginia and to the variegated colonial currency of New England are obvious. They were inconvenient in every way. In the first place, they were not easily portable. It cost £3 6*s.* in 1662 for cartage of the proceeds of the tax levy of the town of Ipswich, amounting to £70 6*s.* 8*d.* In Virginia there was a difference in the value of tobacco notes according to the location of the warehouse where the tobacco was situated. This amounted in some cases to 10*s.* per cwt.

Portability.

Another objection is found in the fluctuations in value of these currencies. The range of tobacco prices in Virginia

from 1619 to 1775 was from 3*s.* 6*d.* down to 1*d.* per pound. We have seen what strenuous efforts were made by the tobacco-planting colonies to restrict the production and what distress and disorder were caused by their inability to do so.

Stability.

Another inconvenience attending these media of exchange was the difference in value between different lots of the same article at the same place. Tobacco, even when up to standard, was of four different kinds, described in the laws as sweet-scented, Oronoko, leaf, and stemmed. Then there were differences in the inspection, some inspectors being more skillful and more strict than others, whereby their receipts or notes came to have a higher price than others. There were differences also arising from different seasons and different cultivators. A large part of the legislation of both Virginia and Maryland was directed to the suppression of "trash." No substance can be considered suitable for the purposes of money, if different parcels of it are of different degrees of goodness.

Uniformity.

Want of durability was another objection to all of these things. There was so much shrinkage and deterioration in tobacco that the notes issued against it could not be safely kept more than one year.

Durability.

Some of the articles used as money in the colonial period could be divided and subdivided without losing any part of their value, while others could not. Grain and tobacco could be so divided. Beaver skins could not. For the purposes of exactitude divisibility is necessary. No article which does not possess this quality can be considered a good medium of exchange.

Divisibility.

It is not absolutely necessary that the substance used as money should be coined. Gold and silver were used as money before they were coined — and then they passed by weight. All that coining does is to save the trouble of

frequent weighing and assaying. Accordingly it is desirable that the substance of which money is composed should be one which can receive and retain a stamp. None of the substances which the early American colonies used in lieu of the precious metals answered this requirement. The putting of wampum shells together in parcels equal to one penny, and higher denominations, easily recognized, was something akin to coinage. So also was the marking of a hogshead of tobacco by an inspector. When so marked it would pass without reweighing or reëxamination. The stamp had here become the sign of value, but the tobacco itself could not be stamped because the substance was not suitable for receiving and retaining an impression.

Cognizability.

All writers are agreed that the six requisites mentioned above are essential to a good kind of money, *viz.*, portability, uniformity, durability, divisibility, cognizability, and stability of value.

Long experience has taught mankind that these qualities are best embodied in the metal gold.

It must not be assumed that gold is absolutely stable in value. When we speak of the value of one thing which measures all values, we mean its purchasing power in terms of those commodities whose supply is unlimited, or not controlled by monopoly. The value of gold thus measured is subject to variations, but it is impossible to measure them with accuracy, even when we compare prices during long intervals of time. We are concerned at present only with the comparative steadiness of value of different things, as, for example, gold and tobacco. If gold is subject to fewer changes of purchasing power than tobacco, it is better fitted to serve the purposes of money and will sooner or later supplant it in that function. If it is subject to fewer changes

Gold not wholly Free from Variations in Value.

than any other known substance, it will supersede all others. The fact that it is not wholly free from variation itself will not prevent it from becoming the sole and universal money of civilized mankind.

The durability of gold is one of the most potent factors contributing to its stability of value. Gold does not deteriorate with age, and its loss by abrasion is slight. The production of each year is added to the accumulations of the past. Hence the mass in existence at any time is so great that its value is not perceptibly affected by any change in the output of a single year or short series of years. This mass may be likened to the ballast which gives steadiness to a ship. Gold thus becomes a good *standard of deferred payments*. The desideratum here is that the value of the future payment shall be as nearly as possible equal to that of a present payment, although absolute equality cannot be expected.

A Standard of Deferred Payments.

The durability of gold makes it also a convenient *store of value*. Gold coins or ornaments that have been buried thousands of years are of no less value than gold fresh from the mine.

Money is a product of evolution, a result of the ages. The better has gradually crowded the worse out of existence. Our own history forms no exception to this rule, for although our colonial ancestors for a time went back to a system almost as rude as that of the Homeric period, they eventually abandoned it and resumed metallic money, which always served as a mental standard even when it was not a legal one. It is a fact of prime importance — we meet it everywhere in colonial history — that in all trading, whether the medium of exchange was wampum, beaver, tobacco, or what not, there was a mental reference to metallic money, most commonly silver. In other words, silver, although

Money a Product of Evolution.

a latent standard, was the real standard at all times and places.

The question may be asked, Why did our ancestors endure the burden of an inferior kind of money so long, when they knew that it was inferior? The answer is that a metallic money is an expensive tool acquired by a community at a considerable cost and sacrifice. The early settlers had very little capital, and preferred to put as little of it as possible into the shape of money, and as much as possible into food, clothing, and implements. They could not have *both* a metallic currency and an axe. They chose the axe as being more important to them, and got along without the coin. Hence the prevalence of paper money. Moreover, the one form of ready capital which was acceptable to all, and therefore could be used as a medium of exchange, was a ready article of export, *e.g.*, in New York, beaver skins; in Virginia, tobacco; in South Carolina, rice, etc. These were the natural money in those sections. Silver could not be kept in circulation, as it was inevitably exported to be exchanged for more valuable kinds of capital (axe, food, clothing). The faster it was coined or imported from the West Indies, the faster it left to buy goods abroad.

RECAPITULATION

Money is a common measure of value, a medium of exchange, and a standard of deferred payments. Like most other commodities, it is the product of labor. Any portable article may answer the purpose of money; some commodities are more convenient than others. Mankind has experimented with many different ones, and has selected gold as the best. The selection has been made by tacit agreement, not by convention.

All trade is essentially barter, even when carried on by the use of gold.

The value of any standard money depends upon its utility or *usefulness*, *i.e.*, upon what the consumers of the commodity are willing to pay for it for other than monetary uses; for instance, *for ornament.*

In every exchange the gold is of the same value as the thing for which it is exchanged, or is so considered by the traders.

The requisites of a good kind of money are portability, homogeneity, durability, divisibility, cognizability, and stability of value. These requisites are found to exist in the greatest perfection in gold.

By the value of gold we mean the quantity of other commodities that it will exchange for, at a given time. As value is a relation existing between different things, it follows that variations of value may arise from causes affecting either of them.

Gold is not wholly free from variations of value, but is subject to fewer changes than any other substance which is fitted to be used as money.

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CHAPTER II

COINAGE

Coinage is the process of identifying, by stamping, a piece of metal intended to be used as money. Coins are of two kinds, namely:

I. Those made by the government for private persons, from metal deposited by them, without limit as to quantity, and full legal tender.

II. Subsidiary coins made by the government for itself, such coins being restricted in quantity, and sold to private persons at more than cost, and being usually limited legal tender.

As regards coins of the first class, the government's stamp is merely a certification of the weight and fineness of the metal composing them. The prime requisites of such a coinage are:

1. That the coins shall contain exactly the amount of fine metal that the law prescribes;

2. That they shall be easily recognized;

3. That they shall not be easily counterfeited or altered;

4. That they shall not be easily abraded by ordinary use.

Subsidiary and Token Coins.

The word "subsidiary" is usually applied to coins which constitute the small change of a country and which are legal tender only for limited amounts. In the United States the silver dollar must be classed as subsidiary also; for, although it is full legal tender, the government does not coin it for private individuals as it coins gold. It is subsidiary, or subordinate,

to gold coins. It passes for much more than the value of the metal contained in it. Professor Taussig has fitly applied the term "large change" to the silver dollar. Coins made of copper or other base metal are called "token" coins. They are subsidiary coins for the smallest transactions.

Subsidiary coins, however much their metallic value may fall below their nominal value, may be kept at par either by restricting their quantity, or by redeeming them on demand. If the quantity is restricted to the actual needs of the country for small change, they will be at par because they are among the necessities of life. Our government redeems its coins smaller than one dollar when presented in sums not less than twenty dollars.

By the coinage act of 1873 the weight of our subsidiary coins was increased slightly, to make them correspond with the legal-tender silver of France. Two half dollars (384 grains) were raised to 25 grams (385.8 grains), equal to the five-franc piece. This change was of no practical importance.

Why made of Metal.

If subsidiary silver coins circulate at a value which is largely imaginary, the question may be asked, Why not make them of some other metal, or even of paper? There are no reasons except custom and convenience. A coin not heavier than a half dollar is more convenient than a piece of paper; it is cleaner, and in the long run is probably cheaper, as it does not require frequent renewal. A cheaper coin might be made out of some other metal, but it is generally best to conform to the habits of the people. Having been always accustomed to a silver subsidiary coinage, no good reason is apparent why we should depart from it.

The shape of coins is usually circular, but some are square, others oblong, others cubical. Many ancient coins were dish-shaped; others in the form of rings. The first coins struck by the government in California were octagonal.

The copper coins of China, called "cash," have square holes in the center by which they are strung on a wire and hung over the owner's neck. The objects to be aimed at in determining the shape of a coin are freedom from abrasion, exemption from alteration, and convenience in handling. Modern commerce tends to minimize the use of gold except to settle international balances. For this purpose fine gold bars are best, as they are subject to hardly any abrasion and are much more convenient to bankers than ordinary coins.

Shape of Coins.

Coins have been made, at different times and places, of iron, lead, tin, brass, copper, nickel, platinum, silver, and gold. There were coins of electrum in the ancient world. This was a mixture of silver and gold found in a natural state in the Tmolus Mountains in Asia Minor and elsewhere. Specimens found in the Tmolus range in modern times have yielded 73 per cent gold and 27 per cent silver. Electrum was also produced artificially, with a larger proportion of silver, in order to debase the currency.

Materials.

In early Rome small payments were made by tale (*i.e.*, by counting), and large ones by weight. The Latin word *pendo*, from which our words "compensation," "expenditure," and "stipend" are derived, means to weigh. The shekel, the talent, the drachma, the pound, the penny, the peso, the livre, the franc, and the mark were originally the names of weights. They are instances of the transference of the name of a weight to a coin.

Weight Coins.

A standard is a measure, by comparison with which the length, size, weight, capacity, fineness, value of other things is determined, as a standard inch, a standard gallon, etc. It is proper, therefore, to speak of a standard of weight, a standard of fineness, a standard of value. Our law says

that the dollar composed of $25\frac{8}{10}$ grains of gold, nine-tenths fine, shall be the standard unit of value, and that ten times this amount shall be the eagle, etc. The amount of fine gold in the dollar is 23.22 grains. The smallest gold coin now produced at the mint is the quarter eagle (two dollars and a half) of the standard weight of $64\frac{1}{2}$ grains. The gold dollar is too small a piece for convenient use. Its coinage was discontinued by the act of September 26, 1890. The coins now authorized to be struck at the mint of the United States are the gold quarter eagle, half eagle, eagle, and double eagle; the silver dollar, the half dollar, the quarter dollar, and the dime; the five-cent piece of nickel and copper, and the one-cent piece of copper.

The Monetary Standard.

We sometimes read of an "ideal dollar," a phrase implying that there may be a dollar whose value is not embodied in any tangible substance, but is purely a mental conception. This is impossible. Money must be something which shall serve as a medium of exchange. There may be as many different ideas as there are different people. How should we choose an umpire to furnish ideas of the relative values of different kinds of property? Yet the Supreme Court of the United States, in the *Legal Tender Cases*, gravely maintained that "value is an ideal thing" and that "the gold or silver thing we call a dollar is in no sense a standard of a dollar."

An "Ideal Dollar" Impossible.

The government receives all the gold deposited at the mint by private individuals and converts it into coin or bars free of charge. All silver, nickel, and copper coins are made by the government from its own metal and are sold to the public for gold or its equivalent. The profit which the government makes on such sales is called "seigniorage." It is the difference between the cost of the bullion and the price received for the coins.

Seigniorage.

The same term is applied to any charge which a government makes for coining a metal for private individuals. Formerly the seigniorage on silver subsidiary coins was only 5 to 7 per cent. Since the great decline in the price of silver took place, it has become more than 100 per cent. Formerly the government could buy only sixteen pounds of silver bullion with one pound of gold. Now it can buy more than thirty-five pounds for the same money.

Deposits of Gold Bullion.

Although the law contemplates the deposit of gold bullion at the mint, or assay offices, of the United States, and the coinage of the same *for the depositor*, yet practically the Treasury buys the bullion and pays for it. The practice of the assay office in paying for gold varies according to the kind of bullion in the deposit. A depositor of bars from known assayers, or smelters, or of foreign coin of which the fineness can be readily approximated, is allowed at once 90 per cent of the value ascertained by weight and calculation of the fineness. The balance is paid after melting and assaying. When the deposit is small, or when bullion is tendered without well-known "ear-marks," no advance payment is made, but the full payment is made after assaying without waiting for coinage. Having bought the bullion, the director of the mint determines what portion shall be coined and what portion converted into bars. A certain portion is always converted into "fine bars" for commercial use, the remainder into mint bars ($\frac{9}{10}$ fine) suitable for coinage.

The successive steps in the making of coins are: (1) assaying, (2) refining, (3) alloying, (4) coining. The bullion is first melted in a crucible. While in the molten state it is stirred until thoroughly mixed. It is then allowed to cool in the form of a brick. Small pieces are clipped from two corners of the brick most distant from each other and

given to two different assayers to test the fineness of the metal. If their tests do not agree within a certain fraction, the brick is returned to the melting pot and the process repeated. When the test is satisfactory and the amount of foreign substance is known, the whole of the impurity is removed by chemical means. Then the requisite amount of alloy is added, by remelting and mixing, to harden the mass. Thus, to nine pounds of pure gold one pound of copper is added, so that the coins shall be nine-tenths fine.

Assaying.

The bullion is rolled into strips or ribbons a little wider than the coin to be struck. It is then "drawn" in a machine which reduces it to the thickness of the coin. The strips are then passed through another machine, which cuts out of them circular pieces, of the proper size, called "blanks." Each blank is examined by an expert both by weighing and by sounding. If one is found too light, or if it does not "ring true," it is returned to the melting pot. If it is too heavy, the excess of metal is removed by filing.

Coining.

The blanks are sent to a machine by which a slight rim is raised around the edge of the piece on both sides, so that its weight shall rest on the rim and not on the whole surface of the coin, in order to minimize the abrasion. This process is called "milling." The blanks are then put in a cylindrical case and sent to the coining machine. At each revolution of the machine one blank drops from the bottom of the cylinder, is seized and conveyed to a sunken steel bed which contains a die that prints one surface of the coin. This bed has a serrated edge or "collar." Directly above this sunken die is a steel stamp containing a die which prints the other surface of the coin. This stamp descends on the blank underneath with sufficient force to impress upon it the letters and figures of both surfaces of

the coin. The pressure also squeezes the coin against the serrated collar, producing an indentation on the edge of the coin, the object of which is to prevent any clandestine removal of metal. If a piece were clipped from the edge, or if any portion were removed by filing, the fraud would be detected by the absence or irregularity of the indentations.

Private Coining Inadmissible.

Experience has shown that the work of coining cannot be safely intrusted to private enterprise. Between the years 1830 and 1860 there were numerous private manufactories of gold coins in the United States. They were situated in Georgia, North Carolina, California, Oregon, Utah, and Colorado.[1] They turned out coins of varying goodness, all purporting, however, to be of the weight and fineness of the government's coins. They were not counterfeits. They did not imitate the designs on the coins of the United States. Many of them bore the names and places of business of the manufacturers. They were ingots purporting to be worth the number of dollars stamped on them. The value of these five-dollar pieces

[1] The mint at Philadelphia has upwards of sixty specimens of private gold coins and many copper ones which circulated in the United States at one time and another. Examples of these private gold coins are shown in the frontispiece, *viz.:*

1. Coined by Templeton Reid of Georgia. Value about $5.00. Mr. Reid afterward removed his coining apparatus to California.

2. Bechtler Mint at Rutherfordton, N. C. Value about $4.90.

3. Letters over the figure of a beaver are the initials of the persons composing the Oregon Exchange Company. Value about $4.84.

4. Letters J. S. O. mean J. S. Ormsby, the coiner of these pieces. Value $9.37.

5. Mormon coin. Letters above the clasped hands mean Great Salt Lake City Pure Gold. Value $4.36.

6. Pike's Peak (Colorado) coin. Value not known.

7. Ingot of Moffat & Co., San Francisco. Value $16.

ranged from $4.36 to $5.00. The people who took them in trade could not distinguish between them and were therefore liable to be cheated. The government did not forbid the private coining of gold until June 8, 1864.

The weight of a new gold eagle, or double eagle, must not vary more than half a grain from the standard weight fixed in the law. That of the smaller gold coins must not vary more than a quarter of a grain. This allowable variation is called the "tolerance of the mint." The "mint price" of gold is the amount of money which a given weight of standard gold will produce when coined. An ounce of gold nine-tenths fine will produce approximately $18.604. The fine ounce is worth $20.671. As the gold dollar contains 23.22 grains, the $20 piece contains 464.4 grains. The troy ounce contains 480 grains, or 15.6 grains more than $20. Then 23.22 : 100 :: 15.6 : 67.1 approximately.

The Mint Price of Gold.

The mint price of gold in England is £3 17*s.* 10½*d.* per ounce. This is the exact amount of money which an ounce of gold of the English standard, $\frac{11}{12}$ fine, will produce by coinage. Anybody can take gold to the British mint for coinage. In order that the holders of gold need not lose time waiting to have it coined, the law requires the Bank of England to buy all the gold offered to it at the price of £3 17*s.* 9*d.* per ounce. The difference between this price and the mint price (1½*d.*) is compensation to the Bank for interest and for the labor of weighing, assaying, etc. Coinage in the United States is free; that is, without expense to the depositor of gold bullion, but he is required to deposit also the alloy used in making the coins, or to pay the cost of it.

We sometimes hear that the Bank of England has raised the price of gold, or is paying a premium for it. This means that its desire to obtain gold is such that it will forego a

part of the 1½*d.* Strictly speaking, there cannot be a premium on gold in a country which has the single gold standard, since that would imply that one gold sovereign is worth more than another of the same weight and fineness. There may be a premium, however, on gold bars over gold coin, or on one kind of coin over another kind. The Bank of England sometimes charges a little more for American eagles than the metallic equivalent in pounds, shillings, and pence, and this is called a premium on American gold. This is not a premium on gold but on its form.

A "Premium on Gold."

There is a serious loss due to the abrasion of gold coin in England. Anybody to whom it is offered may weigh it, and if he finds it below the legal limit of tolerance the law requires him to cut it in half, or otherwise mutilate it, and return the parts to the person tendering it. Practically, however, nobody does this except the Bank of England or the officers of the government. The Bank weighs all coins offered to it and complies with the law by mutilating the light ones. The law, as it stands, throws the whole loss of abrasion of a coin on the last holder. This is a manifest injustice. The same rule prevails in the United States, although our law does not require anybody to mutilate coins of light weight. Anybody may refuse to receive them. So, practically, the loss falls upon the last holder here as in England. The evil is scarcely felt in this country since the circulation of gold is small and the consequent abrasion slight.

Abrasion of Coin.

The new coinage law of Japan (1897) provides that if, in consequence of abrasion from circulation, any of the gold coins fall below the minimum circulating weight, the government shall exchange such coins for others of the same face value without making any charge. It proceeds upon the assumption that it is possible to distinguish between

abrasion caused by ordinary wear and fraudulent abrasion, or "sweating." It is the opinion of some of the officials of the United States Mint that this is feasible, but there has not been sufficient time as yet to decide whether the Japanese experiment is a safe one. In 1891 the British Mint was authorized, by way of experiment, to exchange full-weight gold coins for light ones not mutilated, and an appropriation was made from the public treasury to pay the difference. In 1897 the practice was stopped, showing that the results of the experiment did not justify its continuance.

Fraudulent abrasion and clipping of coins were a great pest in the seventeenth century. The silver coins circulating in the colonies were chiefly Spanish dollars — sometimes called "pieces-of-eight," being of the value of eight reals — and their fractions. They were brought in by trade with the West Indies. Some were coined in Spain and others in the Spanish-American colonies. At their best estate they were not uniform in either weight or fineness, and they had been much tampered with by sweating and clipping. The heavier ones were constantly culled out to make remittances abroad, since they were received in England by weight only. Those which remained in the colonies grew lighter and lighter, until, in 1652, the pieces in circulation had lost about one-fourth of their original weight.

The Spanish Dollar.

When two kinds of money, differing in value, are equally current, the worse drives the better out of circulation. The reason is that brokers, bullion dealers, jewelers, and others who habitually make a profit from the use and handling of the precious metals, select the full-weight coins for melting, or exportation, and pass the light ones into the circulation. The same rule applies in a case where money of two metals, like silver and gold, is

Gresham's Law.

coined without limit at the mint, and both kinds are equally legal tender. If there is a slight difference in the metallic value of the different kinds of dollars, the more valuable ones will be exported by bullion dealers and the less valuable retained for domestic use. This is called Gresham's Law from Sir Thomas Gresham, who explained it to Queen Elizabeth about the year 1559.

Early Colonial Coins.

In order to correct the defects of a constantly depreciating currency and to fix a standard of money, the colony of Massachusetts, in 1652, decided to establish a mint for the coinage of shillings, sixpenny, and three-penny pieces. Conforming to the depreciation that already existed, she gave to the shilling the weight of 72 grains, which was 22½ per cent less than that of the English shilling. The English standard of fineness was preserved. The colony did not itself operate the mint, but made a contract with one John Hull to do the work, requiring him to receive and coin all the silver offered to him and authorizing him to retain as his pay one shilling out of every twenty which he produced. The mint was closed by order of the home government in 1686.

The Pine-Tree Shilling.

These early Massachusetts coins had two different devices. The first issues of the mint were plain circular discs bearing on one face the letters "N E" (New England) and on the other face "XII" for the shillings, "VI" for the sixpences, and "III" for the three-penny pieces. These pieces, by reason of their plainness, offered every facility to coin clippers, by whom they were speedily reduced in size and weight. In order to prevent such fraud a change of design was adopted by which the figure of a tree was stamped on one face and a row of dots and lettering was placed around the margin of the other. This became known as the "pine-tree coinage."

The disorders of the currency due to the clipping and sweating of coin led to different valuations of the Spanish "pieces-of-eight" at different places. On the 18th of June, 1704, a proclamation was issued by Queen Anne on this subject. It first stated the actual value of foreign coin circulating in America, in terms of sterling money, according to the assays of the mint. "Sevil pieces-of-eight old plate,[1] 17 pennyweight 12 grains," were equal to 4*s.* 6*d.* The proclamation then says that "from and after the first day of January next no Sevil, pillar, or Mexico pieces-of-eight shall be accounted, received, taken, or paid within any of our colonies or plantations at above the rate of six shillings per piece, current money, for the discharge of any contracts or bargains to be made after the said first day of January next." Six shillings was considered by the home government a fair average of the various colonial valuations of the Spanish dollar. This valuation came to be known everywhere by the term "proclamation money" or "proc. money." One hundred pounds sterling was the equivalent of £133⅓ proclamation money.

The Proclamation of Anne.

The proclamation was generally disregarded, because it interfered with the habits of the people. Seeing that the proclamation was not regarded, Parliament, in 1707, embodied it in a law and decreed a penalty of six months' imprisonment and a fine of £10 for each violation of it. This act was disregarded as completely as the previous proclamation had been. Each colony continued to keep its accounts in its customary pounds, shillings, and pence, which were different from those of England and which differed among themselves. Thus, in New York, the Spanish dollar was rated at 8*s.* and in Pennsylvania at 7*s.* 6*d.*

It is disregarded.

[1] The word "plate" (Spanish *plata*, silver) is here used to signify Spanish silver money, not bullion. Old plate meant old coinage.

The phrase "money of account" means the money in which people keep their accounts and in which they think.

Money of Account.

The money of account of all the American colonies was pounds, shillings, and pence, but there were no such things in circulation except a limited amount of the pine-tree coinage. The money in actual use was the Spanish dollar and its fractions, more or less clipped and abraded. The division of the dollar into one hundred parts was not made till 1792. By a law of that year Congress enacted that the money of account of the United States should be dollars, dimes, etc., but it did not become so in practice until after the Civil War. Before that era the price of merchandise was quoted in dollars, shillings, and sixpences.

RECAPITULATION

Coins are pieces of metal stamped to indicate their weight, fineness, and the rate at which they shall pass in trade. Ours are of two kinds: (1) full legal tender, being pieces of gold deposited as bullion by private persons, upon which the government has put a stamp showing its weight and fineness; (2) limited legal tender, or subsidiary, being small pieces of silver, nickel, or copper, made by the government from its own material, and sold to citizens for small change.

The standard unit of value in the United States is the gold dollar, but, being inconveniently small, it is not now coined.

The gold coins struck at the mint are the double eagle (twenty dollars) and its submultiples down to two dollars and a half. The subsidiary coins are the silver dollar (one hundred cents) and its submultiples down to one cent.[1]

[1] The exceptional character of the silver dollar will be considered more fully hereafter.

Seigniorage is the profit made by the government in the manufacture of coins. In the United States this profit arises from silver, nickel, and copper coins only.

Coining is now universally considered an attribute of sovereignty. There have been times, however, when private coining was permitted, and such was the case in the United States prior to 1864.

Gold coins when abraded more than one-half of one per cent are legal tender only in proportion to their weight.

The "mint price of gold" is the amount of money that a given weight of gold, say one ounce, will produce when coined in accordance with law.

When two kinds of money differing in actual value are equally current, the worse drives the better out of circulation, because brokers, bullion dealers, etc., select the better for hoarding, or melting, or exportation. This principle is called "Gresham's Law."

Authorities

Linderman's *Money and Legal Tender.*
Muhleman's *Monetary Systems of the World.*
Watson's *History of American Coinage.*
Snowden's *Coins in the Cabinet of the United States Mint.*
Jevons' *Money and the Mechanism of Exchange.*
Falkner's article on the Private Issue of Token Coins, in the *Political Science Quarterly*, June, 1901.

CHAPTER III

LEGAL TENDER

ANYTHING which can be lawfully used in payment of a debt expressed in terms of money, and which creditors are required to accept, is called legal-tender currency, or simply legal tender.

The principle of legal tender did not have its origin in an act of conscious legislation. The government begins, at a time when metal is circulating by weight, to certify the weight and fineness. It stamps small ingots in order to avoid the necessity of frequent weighing. This is coinage. Then people make contracts in terms of the government coinage, and the government enforces the contracts. Under Roman law the creditor was obliged to take in payment whatever the government was coining.

Roman Law of Tender.

The origin of legal tender in the modern world is connected with the reëstablishment of the double standard of gold and silver in Western Europe in the thirteenth century, in place of the single silver standard which previously prevailed. The double standard means that debts may be paid at the debtor's option with either one of two metals coined into money according to a ratio fixed by public authority — providing, for example, that one pound weight of gold shall be the equivalent in law of fifteen pounds of silver, the mints coining both metals without limit for private persons. The establishing of such a ratio was considered, from very

Origin of Modern Law of Tender.

early times, an attribute of sovereignty, and in monarchical countries a prerogative of the crown. Each proclamation of the ratio was virtually a legal-tender act. Debts had to be paid in one or the other of two metals. Consequently any man, or body of men, who could fix the ratio, could decide how much of either should be paid.

From the analytical point of view, a legal-tender act is nothing but an act of legal force, establishing a *new definition* of an old term — for instance, "dollar" — which has been customarily used in making contracts. It is essentially *ex post facto* legislation, binding the courts to a new interpretation of existing contracts, and incidentally inflicting various degrees of injury on those whose position is such that they cannot take advantage of circumstances to modify existing contracts — as for wages. Extreme cases may be imagined where such action might be needful in the interest of the general welfare, but with very few exceptions the passage of such an act is a subterfuge of a government for giving to itself, or to some favored class, immediate advantage over part of the community concerned.

Gold and silver were made full legal tender by the Congress of the United States at the ratio of 1 to 15 in 1792. The coinage act was based upon a report of Alexander Hamilton, Secretary of the Treasury. Hamilton examined the question of the standard with great care, and although the conclusion he reached was erroneous, it is interesting to observe how near he came to the truth. He thought that gold was better fitted to be the standard than silver because it was less liable to fluctuations of value and also because it was the standard *de facto*. He observed that the silver dollar of Spain in actual circulation had no standard value by weight and fineness, but circulated by tale, "very much as a mere money of convenience," whereas gold money had a fixed weight by the custom of merchants. This fixed

weight was $24\frac{3}{4}$ grains of fine metal per dollar.[1] While this consideration favored the adoption of the single gold standard, Hamilton says that "to annul the use of either of the metals as money [of full legal tender] is to abridge the quantity of circulating medium, and is liable to all the objections which arise from a comparison of the benefits of a full with the evils of a scanty circulation." He thought also that a country could draw to itself a greater quantity of the precious metals in international trade by means of the double than of the single standard. This conception was erroneous, but it was the common belief of the time.

Our First Coinage Act.

Hamilton accordingly recommended the double standard at the ratio of 15 to 1. He had not failed to note that the Spanish silver dollars in circulation were of two different coinages, varying slightly in weight. He decided to take neither of them as the exact basis of our coinage, but to take instead the average of the dollars in actual circulation By reason of abrasion they were somewhat lighter than the new coins then issuing from the Spanish mints. With these facts before him and having regard also to the market ratio of the two metals in Europe, he decided that the ratio of 15 to 1 would be not far from the true metallic equivalent. Taking

Double Legal Tender.

[1] Hamilton here perceived the fact that a standard of value may exist, and have controlling force in mercantile circles, without any statute law, and without any conscious action on the part of merchants themselves. The gold standard was in practical operation in his time, just as the silver standard was in operation in the colonies when tobacco and other forms of barter currency were used. The mind of the trader was fixed upon, and governed by, a standard different from the one that most commonly passed from hand to hand. In a book of merit and originality, entitled *The Evolution of Modern Money* (Macmillan, 1901), Mr. W. W. Carlile has traced the existence of what we may call the "latent gold standard" in Europe for a long period before gold became the avowed standard.

the gold valuation of the dollar ($24\frac{3}{4}$ grains of pure metal) as the starting point, and multiplying by 15, the product, $371\frac{1}{4}$ grains of pure metal, was adopted for the silver dollar. The smaller coins were to be of proportionate weight and full legal tender. Congress followed these recommendations in the coinage act of 1792.

The mint began to coin silver in 1794 and gold in 1795. It was supposed that there would soon be a plentiful supply of coins of both metals; but, in order to provide for the interval while the mint was in course of erection and equipment, Congress passed a law making certain foreign coins, of both gold and silver, legal tender in the United States according to their weights respectively. This act was to remain in force three years after the starting of our mint and no longer, but by reason of the difficulty experienced in retaining our own coins in circulation the legal tender of foreign coins was kept in force by repeated reënactments for more than sixty years. We did not have any settled money of our own until after the passage of the act of 1853 providing for a subsidiary coinage.

The first silver dollars turned out by our mint were a little lighter than new Spanish dollars, but they passed in trade for the same value, both here and in the West Indies. Brokers began to collect and export them to the Spanish colonies, where they were exchanged for Spanish dollars, and the latter were brought back for recoinage at our mint.

Its Failure.

There was a profit of one per cent in the operation. As coinage was free, the government was working for bullion brokers without pay, and was not accomplishing the end aimed at. It was not supplying the American people with American money. Accordingly President Jefferson, in 1806, gave an order to the mint to stop the coinage of silver dollars altogether. This order remained in force thirty years.

The legal ratio of 15 to 1, although pretty close to the market ratio at the time when the coinage act of 1792 was passed, did not long remain so. In 1797 the market ratio in Hamburg was 15.47. Gresham's Law asserted itself. American gold coins began to grow scarce. They were melted or exported because they were worth more for that purpose than for debt-paying at home. As early as 1817 they had entirely disappeared from circulation, although the coinage of them continued at the usual rate.

In 1834 the market ratio in Hamburg was 15.73 and gold bore a premium in brokers' offices in the United States of $4\frac{1}{2}$ per cent over silver. Congress had had the subject of a change of the legal ratio under consideration since 1818. In 1834 it passed the Gold Bill, — so called because it was intended to bring gold again into circulation. The ratio adopted was approximately 16 to 1. The amount of pure metal in the silver dollar remained unchanged. That of the gold dollar was reduced from 24.75 grains to 23.2 grains, but was increased in 1837 to 23.22 grains, at which weight of pure metal it now stands. This made the gold dollar 2 per cent less valuable than the silver one at that time. It was a debasement of the currency to that extent. There was strong opposition to the bill, on the ground that it would drive our silver coins out of circulation. Nevertheless, the majority in favor of the bill was very large in both branches of Congress, about four to one in the House and five to one in the Senate.

Our Second Coinage Act.

When the law of 1834 was passed, the premium on gold in the market was $4\frac{1}{2}$ per cent. Anybody having $100 gold could buy $104.50 silver to pay his debts with. The government had never promised to hold the market ratio of the metals steady at 1:15. This had come in the course of time to be 1:15.625. Under the new law anybody

having $100 silver could buy $102 gold to pay his debts with. In other words, the standard was debased 2 per cent. The law of 1834 ought to have provided that preëxisting contracts should be settled on the preëxisting basis.

There were no silver dollars in circulation, since the coinage of them had been discontinued by order of President Jefferson, as already stated. As our smaller silver coins were of full weight, they were melted and exported, and their place in the circulation was taken by light-weight foreign coins, principally Spanish and Mexican. Two halves or four quarters, if new and full weight, were worth about 2 cents more than a gold dollar. Consequently they were collected by brokers and exported. But two halves, or four quarters that had lost 2 cents' worth of silver by abrasion, would circulate, because there would be no motive to melt or export them. From 1834 to 1856 the silver money of this country consisted, to a large extent, of foreign coins, more or less worn, chiefly Spanish and Mexican, but with a considerable sprinkling of English, French, German, and Scandinavian pieces. Every merchant kept a coin-chart manual for handy reference to determine the value of these pieces as they were offered in trade.

Silver Coins in the United States prior to 1853.

In the act of 1853 we adopted the principle of the British act of 1816.[1] The debates in Congress on this bill show that it was the fixed intention of its promoters to establish the single gold standard, and that there was scarcely any opposition to the project. They failed to carry out this intention, however, since they left the silver dollar in the list of coins to be struck at the mint if anybody should choose to deposit silver bullion for that purpose. Our silver dollar was still a favorite coin in China, where it

[1] See page 63.

passed by weight. This was probably the reason why it was not treated like our other silver coins in the act of 1853. The silver dollar was worth four cents more than the gold dollar in the bullion market. Consequently none were to be found in circulation, although upwards of $5,600,000 were coined between 1853 and 1873. All of these must have gone to China except a few which were retained in coin collections and as curiosities. The act of 1853, however, accomplished its main object. It gave the country an abundance of new and bright half dollars, quarters, dimes, and half dimes that would stay at home and serve the purpose of small change. The weight of the half dollar was reduced about 7 per cent, *i.e.*, to 192 grains, and that of the smaller coins in the same proportion. Consequently there was no longer any motive to export them. In 1857 the legal-tender faculty was taken away from all foreign coins, both gold and silver, and they very rapidly passed out of circulation.

Our Third Coinage Act.

In 1873, when the next change took place in our coinage system, the country was under the régime of irredeemable paper. Neither gold nor silver was in circulation. Practically the silver dollar had never been in circulation. To Americans it was an unknown coin. From 1797 to 1806 it had been sent out of the country by speculators to be exchanged for Spanish dollars. From 1806 to 1836 the mint had ceased to coin it altogether. After 1836 its circulation was rendered impossible by reason of its premium over gold in the bullion market.

In 1869 the Treasury Department undertook a revision of the coinage laws. Mr. Boutwell, the Secretary, placed the work in the hands of Mr. John J. Knox, who prepared a bill which made the silver coins of the United States legal tender for only $5.00 in one payment. This included a

silver dollar of 384 grains, but it was omitted by Congress and the "trade dollar," of 420 grains, intended for circulation in China, was substituted. The bill provided that no silver coins except those enumerated should be struck at the mint and that none except trade dollars should be coined for private individuals. The silver dollar at that time was worth about two cents more than the gold dollar. The bill made the gold dollar the unit of value.

Our Fourth Coinage Act.

Mr. Knox's report and the accompanying bill were sent by the Department to chambers of commerce throughout the country and to persons interested in monetary science, in order to get their opinions and advice. They were sent to Congress in April, 1870. The bill passed the Senate on the 10th of January, 1871, but was not reached by the House in time for passage by that Congress. It came up in the next Congress, and after debate in the House, in which the policy of discontinuing the silver dollar was specially discussed, it passed that body, May 27, 1872, by a vote of 110 to 13. It passed the Senate January 17, without a division, and became a law February 12, 1873. The United States thus adopted the single gold standard.

Private persons were allowed to deposit silver bullion at the mint and have it coined into trade dollars for their own account. It was never intended that the trade dollar should circulate in the United States at all, but it was inadvertently placed in the list of coins which were legal tender for $5.00. As soon as the price of silver fell so that 420 grains were worth less than a dollar, it became profitable for owners of silver to have these dollars coined and put in circulation at home. Straightway they began to fill the channels of retail trade. They became so great a nuisance that Congress, in 1876, took away their legal-tender quality altogether. This

The Trade Dollar.

led to a dispute, with a charge of bad faith. So Congress, in 1878, discontinued the coinage of trade dollars entirely. This only aggravated the dispute. Speculators bought up the trade dollars with the expectation that the government would eventually redeem them at par. Nearly $2,000,000 of them were reimported from China for that purpose. Finally, in 1887, Congress passed a bill to redeem at par all that should be presented within six months, and President Cleveland allowed it to become a law without his signature. The number of trade dollars so redeemed was 7,689,036.[1]

The following varieties of legal tender exist at the present time under the laws of the United States:

Present Varieties of Legal Tender.

1. Gold coins, legal tender without any express limit.

2. Silver dollars, and Treasury notes issued under the act of 1890, legal tender "except where otherwise expressly stipulated in the contract."

3. United States notes (greenbacks), legal tender except for interest on the public debt and for duties on imports. Since the resumption of specie payments (1879) these notes have been made receivable for duties by Treasury order, to avoid the trouble of carrying gold to and from the custom house.

4. National bank notes, legal tender in payment of any debt or liability to any national bank; also receivable for all government dues except duties on imports.

5. Silver coins smaller than $1.00, legal tender to the amount of $10 in one payment. Coins of nickel and copper, legal tender to the amount of 25 cents in one payment.

[1] A detailed account of the struggles of the government with the trade dollar is given in Upton's *Money in Politics*.

RECAPITULATION

Legal tender may consist of anything which the law of a country declares shall be received in discharge of an obligation which is payable in money.

There are several different kinds of legal tender in the United States. That of gold coin is the only one which is not subject to any limitations.

If a law of tender is made applicable to debts contracted or to bargains made before its enactment, and it alters the terms thereof, it is unjust. It is sometimes said that a change in the law of tender exhausts itself on past debts; that while people cannot avoid accepting the new legal-tender thing for preëxisting dues, yet that they straightway adjust their business and bargains to the new law, and thus escape further harm. This is true of only a very small part of the community. The masses either do not understand the subject sufficiently, or are so entangled in the social fabric that they cannot protect themselves. For example, no individual workman can raise his wages by his own volition merely because his cost of living has increased.

A law of tender adds nothing to the value of gold coins. The private gold coins that circulated in the United States between 1830 and 1860 were not legal tender, yet they were of equal value with government coins when they contained the same amount of gold. Gold bars are not legal tender, yet they occasionally command a small premium over coin by reason of their convenience in international trade.

The first coinage act of the United States (1792) made all of our gold and silver coins full legal tender at the weight ratio of 1 to 15. Under this act gold gradually disappeared from the circulation, one ounce of it being worth more in the bullion market than fifteen ounces of silver.

The second general coinage act (1834) made both gold

and silver coins full legal tender at the weight ratio of 1 to 16. Under this act silver was expelled from the circulation, sixteen ounces of it being worth more in the bullion market than one ounce of gold. In this act the legal tender was debased about 2 per cent by diminishing the weight of the gold coins.

The third general coinage act (1853) lessened by 7 per cent the amount of fine metal in the silver coins smaller than $1.00, in order to prevent their exportation. It limited the legal-tender faculty of these silver coins to $5.00 in one payment. It did not change the legal-tender act of 1834 in any other particular. The half dollar weighs 12½ grams (French metric system). Two of them are exactly the weight of the five-franc piece. The quarter dollar weighs one-half and the dime one-fifth as much as the half dollar.

The fourth general coinage act (1873) omitted the silver dollar from the list of coins authorized to be struck at the mint and made the gold dollar the unit of value. At that time the silver dollar was worth more than the gold dollar. The act of 1873 put the United States on the basis of the single gold standard.

Legal-tender notes will be considered in a subsequent chapter.

Authorities

In addition to those of the preceding chapter:

Hamilton's *Report on the Mint.*

Laughlin's *History of Bimetallism in the United States.*

Brough's *Natural Law of Money.*

F. A. Walker's *Money.*

Upton's *Money in Politics.*

History of the Coinage Act of 1873, published by the House of Representatives, 1900.

CHAPTER IV

GOLD AS A METAL

THE metal gold occupies a unique place among the substances of which the earth is composed. It is accepted by civilized mankind without compulsion and without limit in exchange for all other kinds of property and for all the services that men render to each other for hire. For this reason it is an object of universal desire. As a mineral it is sought for with greater eagerness than any other substance in or upon the earth.

Gold is yellow in color in the natural state, and is the only metal that is so. Its atomic weight is 196.7, that of hydrogen being reckoned as 1. Its specific gravity is 19.3, being exceeded only by that of platinum, iridium, and osmium. Its melting point is 2014° F., at which temperature there is no perceptible loss by volatilization, even when long continued and often repeated. It is the most ductile of the metals. It can be beaten into sheets $\frac{1}{300000}$ of an inch in thickness. A single grain can be drawn into a thread 500 feet long. As a conductor of electricity it is inferior only to silver and copper.

Where Gold is found.

Gold is found in placers in the beds of existing rivers or in those of past geological ages, which are now dry or uplifted, or buried under new strata. It is also found in veins of rock formation. It has been found in the United States in rocks of all geological ages from the pre-Silurian to the Quaternary. It was the opinion of Professor Newberry that the metal in

fissure veins was deposited there from chemical solutions forced upward from deeply buried rocks of various kinds, from which the gold had been leached under great pressure and heat. Gold is found also in bedded veins of sedimentary rock in conjunction with argentiferous galena, iron pyrites, and other metals, where there is no trace of a fissure. It has been found in common clay, and also traces of it in sea water. Placer gold has been separated from vein formations and conveyed by running water, in conjunction with gravel and other detritus, to the places where it is found.

Gold does not suffer any change by exposure to the air or by being buried in the earth. It is rapidly dissolved in quicksilver at ordinary temperatures, and forms with it an amalgam, either fluid, or pasty, or solid, according to the proportions of each metal present. The quicksilver can be distilled from the mass by heat and recovered by condensation, leaving the gold solid. It thus becomes an agent of supreme importance in the production of gold. Its use was known to the ancients. Pliny says with truth that if gold mixed with impurities is shaken in a vessel containing quicksilver, the latter will absorb the gold and reject the impurities, and that the quicksilver can then be squeezed through a skin like perspiration, leaving the gold pure. Quicksilver has the same affinity for silver as for gold.

Its Affinity for Quicksilver.

Placer gold is of various sizes, ranging from dust up to nuggets weighing many pounds, and of various degrees of purity. That of Australia averages 950 in 1000, being purer than any gold coin now in use; that of California averages 884; that of Montana 895. Native gold is almost always associated with silver. In 1000 parts of placer gold of California, 112 are composed of silver, and 4 of base metal.

Placer Gold.

The most common method of obtaining alluvial or placer gold is by washing river sands. "Panning" was practiced by the Egyptians in prehistoric times. This process consists of stirring with the hands a quantity of gold-bearing sand in a hollow vessel filled with water. The gold, being heavier than the other material, sinks to the bottom. The earthy matter is spilled over the top of the vessel from time to time as the stirring proceeds. When the panful has been thoroughly washed most of the gold contained in the mass will be found in the bottom of the pan. As there is always some sand and gravel left, it is customary to collect the gold by means of quicksilver.

Sluicing is the method by which auriferous sands and gravels are now attacked in places where water can be obtained in sufficient quantity. In the ancient world water from gold-bearing mountains was made to flow over hides, or sheepskins, in which the particles became entangled. Thence, probably, came the legend of the golden fleece.

Sluicing is performed by shoveling gold-bearing earth into running water, which is made to pass through a wooden conduit, on the bottom of which are fastened a series of "riffles," or obstructions, against which the heavier portion of the material lodges. Quicksilver is fed into the stream at various places in the form of a fine rain, being squeezed through chamois leather or canvas to give it dispersion. It passes down the inclined surface and lodges with the other heavy material against the riffles, where it collects the gold by amalgamation. When the first riffle is full, the material suspended in the water passes over the obstruction and is caught in the next one, and so on till all are filled. Then the "clean-up" begins. The gold is found amalgamated with the quicksilver.

Methods of Collection.

Hydraulic mining is sluicing on a large scale, in which the force of a jet of water is used, instead of shoveling, to

break down the bank and move the earth and gravel to the entrance of the sluice. For this purpose a powerful head of water is required, from one hundred to three hundred feet higher than the ground to be operated on. The water is collected in mountains, sometimes at long distances from the works, and brought in ditches which follow the contour of the country, often crossing valleys on high trestlework or by inverted siphons. Sometimes the "pay gravel" is found where there is insufficient drainage, and it becomes necessary to excavate tunnels to carry off the "tailings."

Hydraulic Mining.

One such tunnel in California is 7874 feet long. The water is delivered against the bank through an iron nozzle with something like the velocity of a cannon ball. It soon excavates a hole, which is gradually enlarged until the superincumbent mass falls down. Then this is attacked by the same means, and the whole mass begins to dissolve and follow the drainage line, which brings it to the sluices constructed like those already described, but on a much larger scale. They are operated on the same principles as the smaller ones.

The disposition of the tailings has been the most serious problem of hydraulic mining in California. Not only is the natural drainage of the country altered by these operations, but stupendous quantities of earth are carried down and deposited in the beds of the rivers, which are caused to overflow their banks and spread the detritus over the adjoining lands, to the ruin of agriculture. A vast deal of litigation has ensued, and the state legislature has been compelled to intervene for the protection of the farmers. Hydraulic mining is the most economical of all methods of obtaining gold, the cost being from $1\frac{1}{2}$ cents to 8 cents per ton of material treated. The most expensive is panning, the cost of which is $5.00 to $8.00 per ton.

Gold existing in rock formation is either free-milling or combined chemically with other substances. Often both are found in the same mine. Free-milling ores are treated by crushing and then amalgamating with quicksilver. In reaching the metal and tearing it from the rock, man accomplishes with his own hands what nature has done for him in the case of placer gold.

Quartz Crushing.

There are numerous methods of crushing free-milling ores, the one most largely used being that of the stamp battery. The ore is first reduced to the size of a walnut by a stone-breaker. It is then put into an elongated mortar made of cast-iron, which has a series of iron pestles arranged side by side, so as to be lifted, one by one, by a revolving wheel and allowed to fall. Water is supplied to keep the mass in a splashing state, and also quicksilver to amalgamate the gold as it is released from the pulverized rock. Sometimes the sides of the mortar are lined with copper plates, which have been previously amalgamated with quicksilver, as the amalgam produced in the mortar tends to adhere to the surface of such plates. The contents of the mortar are thus reduced to a "pulp," which is allowed to flow slowly over a series of amalgamated copper plates, by which still more of the gold is amalgamated and retained, the remainder passing off as tailings. The tailings contain some gold, and are subjected to further treatment. The excess of quicksilver in the amalgam is recovered by squeezing it through filter-bags of chamois leather or buckskin, which leaves a solid amalgam. The remainder is evaporated by heat and the vapor condensed by passing through pipes which are submerged in cold water. The solidified gold remains.

There are two important chemical processes for the extraction of gold from sulphides and other refractory ores: one by chlorine, the other by cyanide of potassium. By

the former the ore is first reduced to sizes small enough to expose all the gold contained in it to contact with chlorine gas. It is then roasted, either in a reverberatory or a revolving furnace, in order to expel sulphur, arsenic, and other impurities which would impede the action of the chlorine. The charge is then drawn from the furnace and allowed to cool, after which it is shoveled into a vat and impregnated with chlorine gas. Then it is leached with water as wood-ashes are leached for making lye. The resulting liquor contains chloride of gold, which is usually precipitated by adding to it a solution of sulphate of iron, the gold falling to the bottom in the form of a powder, and usually in a very pure state, sometimes as high as 990. Precipitation can be effected also by passing the solution over charcoal, to which the gold adheres, the charcoal being afterwards burned and the gold recovered.

Chlorination.

The cyanide process is of comparatively recent date. It has been in operation in the United States about twenty years; in South Africa a little longer. A solution of cyanide of potassium will dissolve metallic gold. This affinity is now the basis of great industries and has enabled mankind to save large quantities of the precious metal that would otherwise have been lost. The process is substantially like that of chlorination, except that roasting is not generally required. The ore is first comminuted, as in chlorination, and placed in large vats, where it is leached by a dilute solution of cyanide, the liquor being allowed to remain until all the gold has been extracted. It is then drawn off by a stopcock into a box under the vat. The gold is precipitated by zinc shavings, and falls to the bottom of the box in the form of a slime. Another method of precipitating the gold is by electrolysis. A current of electricity is passed through the solution, and the gold is precipitated on

The Cyanide Process.

thin sheets of lead suspended in it and to which it adheres. These are melted in order to recover the gold. More recently sheets of aluminum have been used instead of lead, as the gold can be removed without injury to the sheets. The cyanide process has added largely to the productiveness of the gold fields of South Africa, and has made the accumulated tailings of past years a source of profit. It has made many mines profitable that could not be worked before.

There are also many methods of extracting gold from metals associated with it, by smelting.

It was the opinion of Professor Newberry twenty years ago that nine-tenths of all the gold in the possession of mankind had been obtained from placer deposits. At the present time the greater part of the annual increment is obtained from veins in rock formation.

RECAPITULATION

The metal gold is the common medium of exchange and measure of value among civilized peoples. It was used for purposes of ornament in the ancient world before it was used as money.

It is found in detached fragments and particles in the beds of existing rivers and also of ancient ones now dry. In this situation it is called placer gold. The greater part of the metal now in the possession of mankind is placer gold. The most important agent for the recovery of placer gold is quicksilver, which dissolves it and forms an amalgam with it, the earthy matter being rejected. The quicksilver can be easily separated from the amalgam and used again. Placer gold has been detached from rock formations and conveyed by running water to the places where it is found.

Gold exists in rock formations in a comparatively pure state, and also in chemical combination with other substances. It has been found in the United States in rocks of all geological ages.

Placer gold is easily separated from the earthy matter associated with it by means of water and quicksilver.

Gold in rock formation is obtained by crushing the rock and either amalgamating with quicksilver, or treating it by chlorination or cyanide of potassium, or by smelting.

CHAPTER V

GOLD PRODUCTION

ACCORDING to the statistics of the Director of the Mint, the world's production of gold for the first half of the nineteenth century was $787,463,000, and for the second half $6,914,679,100.

The chief gold-producing countries at the beginning of the century were Mexico, Colombia, Brazil, Peru, and Buenos Ayres in the western hemisphere, and Russia and Hungary in the eastern. Small quantities were obtained also from the East Indies and from Africa. From 1801 to 1810 the average annual yield from all countries was about $12,000,000, two-thirds of which came from American mines. Revolutionary disturbances in Mexico and South America, which broke out in 1810 and continued till 1824, caused a great reduction of their output of both gold and silver. The world's production of gold declined to an average of $7,600,000 per year, which was not sufficient, in the opinion of Mr. William Jacob, a leading authority for that period, to supply the amount used in the arts and make good the loss by abrasion, shipwreck, and other accident. After the restoration of peace in those countries there was a gradual gain in their production of gold. That of Russia increased also, her average output from 1837 to 1848 being $12,500,000 per year, or more than that of the whole world at the beginning of the century. The details of production

First Half of the Nineteenth Century.

for the first half of the century, as computed by the Director of the Mint, are the following:

Period	Annual Average	Total for Period
1801–1810	$11,815,000	$118,152,000
1811–1820	7,606,000	76,063,000
1821–1830	9,448,000	94,479,000
1831–1840	13,484,000	134,841,000
1841–1850	36,393,000	363,928,000
Half century	$15,749,200	$787,463,000

On the 19th of January, 1848, James Wilson Marshall found a small lump of gold in the tail-race of Sutter's saw-mill in El Dorado County, California. This discovery led to a search in the bed of the stream and in the adjoining ground, which was found to contain rich deposits of the precious metal. The news spread like wildfire throughout California and the Pacific coast of North and South America, and later to the Atlantic States, and all civilized countries, leading to a great immigration of gold-hunters. The production of the metal in California alone in 1850 was $36,000,000, being equal to the annual average of the whole world during the preceding decade. It reached $56,000,000 in 1851. In the latter year a similar discovery of placer gold was made in New South Wales, Australia, followed by a still more important one in the colony of Victoria. These discoveries were also attended by public excitement and heavy immigration. The production of gold in Australia and New Zealand rose to $65,000,000 in 1854. Concurrently with these discoveries, there was a considerable increase of production in Russia, which reached $25,000,000 per annum.

California and Australia.

The next great discovery of the precious metals was that of the Comstock lode in Nevada. This is a fissure vein

four miles long in rock of the Tertiary age. It is situated at the base of Mount Davidson in the Virginia range, an offshoot of the Sierra Nevada. In the central part of the fissure its width is about 3000 feet. The gangue, or vein-stone, is quartz, not uniformly distributed in the fissure, but coagulated in large bodies called "bonanzas." The magnitude of this deposit may be inferred from the fact that, since 1861, when it was first worked scientifically, it has yielded $350,000,000 of bullion, and that 190 miles of shafts and galleries have been excavated in it. Forty per cent of the bullion produced was gold and 60 per cent silver. In 1882 the richest ore bodies of the Comstock lode had been exhausted, and the annual yield had fallen to $1,333,000, from which point, however, there was a recovery to $7,000,000 in 1887, due to the working of low-grade ores that had been previously neglected.

The Comstock Lode.

In the meantime (in 1884) a discovery had been made in South Africa that was destined to surpass in magnitude the Comstock and every other deposit of the precious metals that the world had ever seen. This was in the Witwatersrand of the Transvaal. Here the country rock is a bed of sandstone, interlaminated with deposits of conglomerate, which the Dutch call "banket." This conglomerate carries the gold, the average being ten pennyweights per ton of material. Borings to the depth of 3500 feet have found the gold-bearing reef undiminished. The outcroppings of the reef have been traced for a distance of forty miles. The production of the Transvaal in 1898 was $78,070,761. There was an interruption of the working of the Rand mines in the latter part of 1899 and in 1900 by reason of the war with Great Britain. In the latter year the production fell to less than $10,000,000, but after the war it rose, in 1903, to $59,000,000, notwithstanding a

South Africa.

great scarcity of labor in South Africa. There are other deposits of gold in the Transvaal and in Rhodesia, which may prove to be important.

The Klondike.

One of the most surprising discoveries of modern times is that of the gold placers of the Klondike in the Yukon territory of Canada. These are deposits underneath ground which is perpetually frozen. The method of obtaining the gold is by sinking a shaft through the frozen ground by means of hot bowlders. Then a drift is run by building a fire against the face of the ground. The gravel is thrown out and left till summer, when it thaws and is washed by panning. All the gravel thrown out by two men in eight months of winter can be washed in two months of summer. Of course these deposits must have been laid down at a time when the climate of that region was much warmer than it is now. The output of the Klondike reached its maximum (about $21,000,000) in the year 1900, that of Canada entire being slightly under $28,000,000. There has been a gradual decline since that time, the production of Canada falling in 1908 to $9,842,100. Placer beds similar to those of the Klondike exist at Cape Nome, Alaska. The yield of Alaska reached $18,489,400 in 1907, and the output now shows a yearly increase.

Cripple Creek, Colorado.

The most important gold-bearing district in the United States now is that of Cripple Creek, Colorado. The ore at this place is a telluride known to mineralogists as calaverite. The country rock (says Mr. Philip Argall in *Mineral Industry*) is altered andesite, granite, or phonolite, containing thinly disseminated iron pyrites and tellurium minerals. At or near the surface the tellurium is oxidized, and the gold, when visible, exists as an ochre-like powder, "mustard gold." By roasting, the tellurium is oxidized and the gold set free in the metallic

state easily soluble by cyanide or chlorination. The yield of Cripple Creek and the adjoining territory was curtailed in the year 1903 to the extent of $6,000,000 by labor troubles.

The output of Australasia rose to nearly $89,000,000 in 1903, due mainly to rich workings in western Australia. Since that year, however, there has been a gradual decline in the annual returns, which fell to about $73,000,000 in 1908, or $16,000,000 less than in 1903.

Second Half of the Century.

Statistics of the world's production of gold in the second half of the century, as published in annual reports of the Director of the Mint, are as follows:

Period	Annual Average	Total of Period
1851–1855	$132,513,000	$662,566,000
1856–1860	134,083,000	670,415,000
1861–1865	122,989,000	614,944,000
1866–1870	129,614,000	648,071,000
1871–1875	115,577,000	577,883,000
1876–1880	114,586,000	572,391,000
1881–1885	99,116,000	495,582,000
1886–1890	112,895,000	564,474,000
1891–1895	162,947,000	814,736,000
Forty-five years	$124,892,000	$5,621,602,000
Single Years:		
1896		$202,251,600
1897		238,812,000
1898		287,428,600
1899		306,584,900
1900 (estimated)		258,000,000
Second half century		$6,914,679,100
First half century		787,463,000
Century		$7,702,142,100

Probably 10 per cent of the world's gold production escapes the notice of statisticians altogether.

The world's production of gold from 1901 to 1908 as computed by the Bureau of the Mint was:

1901	$260,992,900	1905	$380,288,700
1902	296,737,600	1906	401,973,200
1903	327,702,700	1907	410,555,300
1904	347,377,200	1908	441,932,200
		Total	$2,867,559,800

The production of 1908 came from the following named sources:

Africa	$166,520,500	British India	$10,598,500
United States	94,560,000	Canada	9,842,100
Australasia	73,327,300	China	8,647,300
Russia	28,052,200	All others	28,013,100
Mexico	22,371,200	Total	$441,932,200

The production of the United States in 1908 came from the following named sources:

Colorado	$22,871,000	Montana	$3,160,000
Alaska	19,858,800	Arizona	2,500,000
California	19,329,700	Idaho	1,443,500
Nevada	11,689,400	Oregon	905,900
South Dakota	7,742,200	All others	1,112,800
Utah	3,946,700	Total	$94,560,000

The world's production of gold in 1909 was $454,422,900; that of the United States was $99,673,400.

The amount of gold in various forms in Europe and America in 1848 was estimated by Tooke and Newmarch (*History of Prices*, VI, 230) at $2,800,000,000, and of silver at $4,000,000,000, both metals being then available as money. To this mass, whether greater or less, there was added in the next twenty years $2,000,000,000 of gold and $680,000,000 of silver.

It was the opinion of Cairnes and Jevons of England, of Levasseur of France, and of Soetbeer of Germany, eminent

economists and statisticians of the last half century, that the great output of gold in the fifties and sixties had caused an average increase of the prices of commodities equal to about 20 per cent. In some cases the increase was greater than the average, in others less, and in still others it counteracted a decline of price which would ordinarily have taken place by reason of new inventions and improved processes of production. The four authorities named, working independently of each other, reached this opinion about thirty years ago, and it may be accepted as one of the established facts of statistical science.

Effect of New Gold on Prices.

The way in which new supplies of gold operate on prices will now be considered. The essential quality of gold is that it constitutes purchasing power. It is *per se* a demand for goods. People do not mark up the prices of the things they offer for sale merely because new gold mines have been discovered, however rich they may be. If a portion of the community (gold miners or others) should find two dollars in their pockets where there had been only one dollar before, prices would not rise in consequence merely of that fact. Tradesmen would ask the same prices for their wares, laborers would work for the same wages as before, buyers would expect to receive the same quantities of goods for a dollar as before. But the possession of double the quantity of money by the fortunate persons would double their demand for goods, and this increase of demand would cause an advance of prices. The attempt to supply the demand would call for more labor and cause an advance of wages. Then the advance of wages would enable the wage-earners to improve their style of living by buying more goods, and there would be a further advance in prices unless it should be counteracted by new facilities of production and transportation.

Its Modus Operandi.

It was in this way that the new supplies of gold operated to cause the advance of both prices and wages in the twenty years succeeding the great gold discoveries of California and Australia. The community was not made richer by using two dollars instead of one to transact a given amount of business, but an advantage was given, as Professor Cairnes showed at the time, to wage-earners over *rentiers* and others having fixed incomes. The former had steadier employment and better pay, and a fairer chance to rise in the world, while the latter were obliged to pay higher prices for consumable goods without any enlargement of their income.

Another fact shown by the foregoing statistical tables is that the production of gold in the second half of the century reached a minimum in the period 1881–1885, the average annual output being less than $100,000,000, and that soon afterwards an extraordinary increase took place. In the last decade, 1891–1900, the production was more than twice as great as that of the first decade, 1851–1860. Why has not the same effect on prices been noticed as was observed after the great output of California and Australia? There has been some advance in prices during recent years, which may be fairly attributed to the new supplies of gold. The counteracting forces of new inventions and facilities of production and transportation, and the bringing of new land under cultivation, have been very active and potent during this time. Yet it is difficult to escape the conviction that we are now confronted by another period of advancing prices, due to the great outpour of gold described above, which seems likely to continue and increase for some years.

Prospect of Continued Advance.

In a recent monograph[1] Professor Kemmerer of Cornell

[1] *Money and Credit Instruments in their Relation to General Prices*, by Edwin Walter Kemmerer, New York, 1907.

University has sought to prove by the trade and labor statistics of the period 1879–1904 that general prices in the commercial world vary directly with the quantity of money in use. This is called the quantity theory of money. It affirms that prices rise as the quantity of money increases, and *vice versa*, *provided other things are equal.* Thus stated, it is generally accepted by economists. But the other things assumed to be equal to-day may not be so to-morrow. Among them must be reckoned the rapidity of the circulation, the progress of invention, the vicissitudes of the crops, peace and war among nations, banking facilities, and the state of business confidence or depression. Professor Kemmerer reckons bank checks, and all other credit instruments which perform the office of money, as real money for the purposes of his argument. He attacks the problem with mathematical formulæ where few critics will have patience to follow him. One such (Professor Persons of Dartmouth College) has sought to do so, and his conclusion is that "whatever may be the fact, the statistics presented by Kemmerer do not demonstrate that general prices move in sympathy with relative circulation." In his opinion the statistics available are not adequate to answer the problem.[1]

The Quantity Theory.

The world's consumption of new gold in the arts in 1907 was estimated by the Bureau of the Mint at $135,000,000.

RECAPITULATION

The production of gold in the first half of the nineteenth century was little more than sufficient to supply the amount used in the arts and to make good the losses from abrasion and accident. About the middle of the century there was a great increase, due to discoveries of placer mines in

[1] "The Quantity Theory, as tested by Dr. Kemmerer," by Warren M. Persons, *Quarterly Journal of Economics*, February, 1908.

California and Australia. The annual production of the world was quadrupled. Ten years later the Comstock lode of Nevada began to yield large amounts of the precious metals, $350,000,000 having been taken from it in about twenty years, 40 per cent of which was gold.

In 1884 the greatest discovery of gold the world has ever known was made in the Transvaal republic of South Africa. These mines, although yet in their infancy, have yielded $78,000,000 in a single year. Discoveries only second in importance to those of South Africa were made in the last decade of the century in the Klondike region of Canada, in Alaska, in Cripple Creek, Colorado, and in West Australia.

The world's gold production in the second half of the century was nine times as great as during the first half. That of the whole century was nearly eight thousand millions of dollars.

The new supplies of the mid-century caused an average advance in the prices of commodities of about 20 per cent.

As gold is purchasing power, new supplies of it constitute new demand for goods. Prices rise in consequence; first, in the mining districts, then gradually throughout the civilized world. The new demand calls for more labor and leads to an increase of wages. The wage-earners are enabled to buy more goods, and this causes a further advance of prices. A redistribution of earnings takes place to the advantage of the producing classes and to the disadvantage of those having fixed incomes. Prices of commodities follow the law of supply and demand in this case as in others.

The new supplies of gold in the last decade of the nineteenth century and in the first decade of the twentieth appear to have caused an advance of prices.

Authorities for Chapters IV and V

Jacob's *The Precious Metals.*

Cairnes' *Essays in Political Economy* ("The Gold Question").

Jevons' "On the Variation of Prices and the Valuation of the Currency since 1787," in the *Journal of the Statistical Society of London*, June, 1865.

Tooke and Newmarch's *History of Prices*, Vol. VI.

Lock's *Gold, Its Occurrence and Extraction.*

Percy's *Metallurgy, Silver and Gold.*

Phillips and Louis' *On Ore Deposits.*

Rothwell's *Mineral Industry* (annual).

CHAPTER VI

THE GOLD STANDARD

SPEAKING broadly, it may be said that the ancient world had the double standard of silver and gold; that the single silver standard prevailed during the Middle Ages, from the seventh century to the thirteenth; that the double standard was then reintroduced and prevailed in Europe and America till the beginning of the nineteenth century, and that it has now been superseded by the single gold standard.

The gold florin, first coined by the city of Florence about the year 1252, was introduced to meet the needs of the growing commerce of the Italian republics. The convenience of gold in making large payments had been observed by the crusaders at Byzantium. The idea of a gold currency was brought back in this way to Western Europe, from which it had disappeared long before in the penury of the dark ages. Gold thus became an addition to, not a substitute for, silver money, and thus the double standard was reëstablished.

Market Values of the Precious Metals.

The market values of the two metals, gold and silver, are subject to the law of supply and demand like other commodities; they are liable to change of value with reference to each other. Sixteen pounds of silver may be worth more than one pound of gold today, and less at another day. One of them may be in greater demand in India than in England, and so on. There are persons in every community (bankers, brokers, and bullion dealers) who seek to

make a profit out of these changes by exporting or melting coins. Theirs is a perfectly proper vocation, as legitimate as the getting of gain from any mercantile transaction, yet it has been held in great opprobrium at some periods in the world's history, has been treated as a crime, and severe laws have been passed to punish persons guilty of it. The community was put to inconvenience by finding either gold or silver coins growing scarce in the circulation. These were called "coins of the realm." They were regarded as belonging in a peculiar sense to the country whose stamp they bore, whereas they were the exclusive property of individuals, who had the same right to dispose of them as of their sheep or oxen. The enactments in various countries against trading in the precious metals, and especially against exporting or melting them, form a remarkable chapter of human fatuity and folly. It was impossible to execute the laws passed for this purpose. A remedy for the alternate drains of gold and silver was accordingly sought by changing the legal ratio. "In France," says Mr. W. A. Shaw,[1] "the ratio of gold to silver was changed in a single century more than one hundred and fifty times." To enumerate all the changes of ratio that took place in Europe from the middle of the thirteenth century to the beginning of the nineteenth would be a hopeless undertaking.

Experience of England.

The true solution of these difficulties was first reached in England. This country had had her share of the loss and vexation due to changes of the ratio. She had also visited cruel punishments on individuals for melting and exporting the precious metals. All attempts to enforce these foolish laws were eventually abandoned, and it came to pass in the reign of Charles II that the guinea of gold, although proclaimed by royal authority to be the equivalent of 20*s.* in silver,

[1] *History of Currency*, p. 31.

passed in trade for 21*s.*, and no attempt was made by the government to interfere. The guinea remained as a trade coin till the third year of George I (1717), when another proclamation was issued making it legally equal to 21*s.*, at which figure the ratio to silver was about $15\frac{1}{5}$ to 1.

As gold was slightly overrated at the ratio of $15\frac{1}{5}$, there was a tendency to export silver; and for this purpose the full-weight coins were selected. So it came about in the course of half a century that the only silver coins remaining in circulation were those which had been much reduced in weight by abrasion or by fraudulent clipping. The evil became so intolerable that Parliament, in 1774, passed a law providing that silver coin should not be legal tender for more than £25 in one payment, except by weight at the rate of 5*s.* 2*d.* per ounce. It was enacted at the same time that gold coins deficient in weight should be called in and recoined, and that thereafter such coins, if under a certain weight, should not be legal tender at all. The restriction of the legal tender of silver was to continue two years. The expectation of Parliament was that some effectual and permanent steps would be taken to deal with the evil of light coins in that interval, but since nothing was done, the act of 1774 was renewed in 1776 for two years more. In 1778 it was renewed for seven years, and then by repeated renewals it was carried forward to 1798. Another clause was now added that no more silver should be coined at the mint for private persons.

Act of 1774.

The significance of this legislation was not perceived at the time. It had not been the intention of Parliament to establish the single gold standard. The question of standard was not under consideration at all. What Parliament did in 1774 was: (1) to put the gold coin in a state of perfection by recoining

A Tentative Step.

the defective pieces and making light coins unavailable in payments thereafter; (2) to limit the legal-tender faculty of the silver money then in circulation. The mint was still open, and anybody could have silver bullion coined into money of full weight and full legal tender. But since silver was undervalued at the ratio of $15\frac{1}{2}$, nobody would take it to the mint. Thus all the conditions of the single gold standard were in practical operation without any fixed intention of Parliament to bring it about, or any knowledge that it had been done.[1]

Gold Standard adopted.

It was noticed, however, that the inconveniences of a shifting ratio had disappeared. There was plenty of gold money for large transactions and of silver money for small ones. Although the silver coins were deficient in weight, they answered the purposes of small change. After the experience of a quarter of a century, Parliament and people were convinced that the act of 1774, although adopted as a temporary measure, ought to be made permanent. Accordingly it was made so in 1799. Yet it was not until 1816 that the true philosophy of the step was well enough understood to secure its enactment into a settled law. In that year it was enacted that the gold coin of the realm, when of full weight, should be full legal tender and should be coined for private persons to any amount, and that silver coin should not be legal tender for more than 40*s.* in one payment, and should be coined only on government account and should

[1] "The fact that a change in the monetary standard of the country, while it was in actual process of accomplishment under their eyes, could have escaped the recognition of contemporary observers, seems at first sight to be of so marvelous a character as to pass the bounds of belief. Yet that it was a fact is beyond all question."—CARLILE'S *Evolution of Modern Money*, p. 18. The truth was pointed out by Lord Liverpool in 1805 and Mr. Carlile properly calls it "a genuine stroke of genius" on his part.

be reduced in weight 6 per cent. This law, which established the single gold standard, remains in force to the present day.

The United States and Portugal.

In 1853 the United States followed the example of Great Britain, by reducing the weight of its silver coins smaller than $1.00 and making them legal tender for only $5.00 in one payment. The statesmen who passed this law supposed that they were adopting the single gold standard, but this was not legally accomplished until 1873, as has been explained in Chapter III.

The kingdom of Portugal adopted the single gold standard in 1854.

Experience of Germany.

In the year 1857 the states composing the German Zollverein and the empire of Austria entered into a monetary treaty by which they adopted the single silver standard. The treaty provided that any of the contracting states might coin gold crowns and half crowns to circulate at their market value. It was expressly stipulated that these should not be legal tender. They might be received at the public treasuries, however, at rates to be fixed by the respective governments at least once every six months, but the rate should not be higher than the average commercial rate for the preceding six months. The official rate might be changed oftener if the market rate should make such change necessary.

It happened at this time that France was importing gold and exporting silver on a very large scale. As the market ratio was now 15.27 and the legal ratio 15.50, there was a profit to bullion dealers of $1\frac{1}{2}$ per cent in the traffic. The gold crowns of Germany were drawn to Paris as fast as they came from the mints, and the country was left with silver coins only for her domestic trade. These were so bulky and inconvenient that they were largely supplanted by

issues of bank notes which were subject to varying rates of discount in different cities and states. This condition was considerably aggravated by the heterogeneousness of the silver coins of the several states — thalers, marks, florins, gulden, kreutzers, etc. There was a very general demand for a uniform system of coins; and, when the question was brought up for solution after the consolidation of the German Empire, it was decided by the government to make gold the standard, with a silver subsidiary currency — in other words, to adopt the English system. The first bill for this purpose became a law December 4, 1871. It discontinued the coinage of silver except for the government. It provided for the coinage of ten-mark pieces of gold (equal to $2.38), of which 139½ should contain one pound of pure metal; also twenty-mark pieces of double the weight; and all gold coins were made unlimited legal tender. For the purpose of settling preëxisting contracts and of exchanging gold for silver coins, it established the ratio of 15½, which was the market ratio at the time. Provision was made for calling in and melting the outstanding silver money and exchanging gold for it out of the funds in the Imperial Treasury — practically the French war indemnity. Another law containing further details was passed July 9, 1873. This law definitely established the gold standard and provided a new subsidiary coinage based upon the silver mark, which should be legal tender for only twenty marks in one payment. It was provided that the old thalers (three-mark pieces) should be full legal tender as long as they should remain in circulation. Under the law for taking in and melting the old silver coins upwards of 7,000,000 pounds weight of fine silver were sold in the open market between 1873 and 1879. The price of silver declined 9*d.* per ounce during that time. The sales were then suspended,

Act of 1871.

Act of 1873.

leaving 339,000 pounds of silver bullion in the Imperial Treasury.

An order was issued in the year 1900 to convert the residue of bullion into silver subsidiary coins during the next ten years. There are still in circulation in Germany about 125,000,000 of silver thalers, or three-mark pieces, which are full legal tender. They occupy the same position as our silver dollars and the French five-franc pieces. The Imperial Bank, or any other bank in Germany, can pay them out at par in liquidation of all claims against them. While this condition exists Germany cannot be considered strictly on the gold basis.

Treasury Order of 1900.

There was a brief bimetallist revival in Germany in 1894–96. It grew out of the low price of grain, which was erroneously ascribed by the landowners, or Agrarian party, to the demonetization of silver. Chancellor Caprivi so far yielded to the demands of this party as to authorize a commission to investigate the question. It consisted of sixteen members, and it held twenty-one sessions and took a large amount of testimony, but came to no resolution whatever. Soon after this commission came to an end Chancellor Caprivi retired from office and was succeeded by Prince Hohenlohe. Thereupon the Agrarians in the Reichstag started up afresh and on the 16th of February, 1895, prepared a motion asking the government to take the initiative in calling a new international monetary conference. This motion was supported by a large majority of the Reichstag, and the government somewhat reluctantly referred it to the Bundesrath, whose consent was necessary. Nearly a year was consumed in the deliberations of the several states composing the Bund. On the 16th of February, 1896, Prince Hohenlohe announced that the German states had unanimously rejected the motion to convoke an international monetary conference.

Bimetallist Agitation Ineffectual.

In 1874 Sweden and Norway followed the example of Germany by adopting the gold standard, and Holland did the same in 1875.

At the beginning of the nineteenth century France had the double standard at the ratio of $15\frac{1}{2}$. This ratio had been adopted in 1785, at the instance of Calonne, Comptroller-General. The Revolution came on and the monetary system was plunged in chaos by issues of irredeemable paper so vast that they could only be cleared off by repudiation. Then the statesmen of the republic passed the coinage law of 1803, intending to establish the single standard of silver. The law began with a general provision that five grams of silver $\frac{9}{10}$ fine should constitute the monetary unit bearing the name of the franc. The measure was before the legislative body three years. Eight reports were made upon it, the point in controversy being the various methods proposed for utilizing gold in the currency while making silver the sole standard. No decision was ever reached on this point, but at the last moment a clause was added to the bill providing that gold pieces of 20 francs should be coined at the rate of 155 to the kilogram. Under this law five grams of silver would constitute 1 franc, and five grams of gold $15\frac{1}{2}$ francs. The debates and reports show that there was a general understanding that if the market ratio should change so as to make a recoinage necessary, the gold should be recoined and the silver franc kept as the invariable measure of value. There was nothing on the subject of legal tender in the law, but since all debts were payable in francs, and since two kinds of francs were authorized to be coined, the law really established the double standard at the ratio of $15\frac{1}{2}$, which ratio already existed by virtue of the law of 1785.

French Monetary Law of 1803.

It has been frequently asserted that the French law of

1803 kept the market ratio of the two metals steady at the legal ratio, *i.e.*, at $15\frac{1}{2}$, until 1873. This is an entire mistake. There were only six years in the seventy in which the market ratio was approximately $15\frac{1}{2}$. These were 1806, 1807, 1811, 1820, 1851, and 1867. In 1821 gold money had nearly disappeared from France and the circulation consisted of silver exclusively, and so continued until 1851, when the great outflow of gold from California and Australia cheapened that metal, putting the market ratio below $15\frac{1}{2}$. The ratio remained below $15\frac{1}{2}$ till 1867. During that interval France imported gold to the amount of $600,000,000, and exported so much of her silver to India that she suffered inconvenience for the want of small change. She was compelled to coin gold pieces as small as five francs. The government attempted at first to adopt the English system of subsidiary silver coins, limiting their legal-tender faculty to fifty francs in one payment. Accordingly in 1864 it brought before the Corps Législatif a bill lowering the fineness of the coins smaller than five francs to $\frac{835}{1000}$, thus reducing their value about 7 per cent. The next step taken was the formation of the Latin Monetary Union.

Did not keep the Market Ratio Steady.

This was an attempt, beginning in the year 1865, to establish uniform coinage on a bimetallic basis, with concurrent circulation, by treaty among four European countries (France, Belgium, Switzerland, and Italy), in which bimetallism already prevailed. The union proved to be an embarrassment to all the nations concerned, and resulted in the adoption of the single gold standard by all of them in succession. This change was adopted by simply discontinuing the coinage of silver for private individuals and limiting it to subsidiary coins struck on government account. The union still exists, but it has been a source of trouble, waste, and loss to all the countries so united.

The Latin Monetary Union.

Under the treaty of 1857 with the states of the German Zollverein the single silver standard prevailed in Austria-Hungary, but the currency in actual use was irredeemable paper. The monetary unit was the silver florin, the normal value of which was 45.3 cents of our money. In 1879, in consequence of the heavy decline in the price of silver, the government gave orders to the mints in both Austria and Hungary to receive no more of that metal from private individuals for coinage. The effect of this order was to make government paper money the standard, and this paper varied somewhat from day to day in comparison with gold, but it no longer followed the downward course of silver. The paper florin was worth in 1879 about 42 cents. In 1892, before the currency reform was adopted, it was worth 41 cents. If it had kept pace with the decline of silver, it would have been worth only 30 cents. Austria had a gold coinage at this time, but it was not legal tender. In 1892 she decided to resume specie payments in gold. She first fixed a ratio at which all paper money and paper obligations should be redeemable. The ratio decided upon was 119 paper to 100 gold, as this had been the average ratio prevailing in the market during the thirteen years from 1879 to 1892.

Austria-Hungary.

Adopts the Gold Standard in 1892.

The next step taken was to pass a coinage law. The krone (crown) of gold was made the monetary unit, containing 4.7 grains of fine gold, the ten-crown piece being worth $2.026 of our money. Silver was to be coined only for the government and to be legal tender for fifty crowns. The government was authorized to borrow gold sufficient to redeem its outstanding notes amounting to 312,000,000 florins. Gold to the amount of 112,000,000 florins was borrowed, and this, together with some reserves in the Treasury, was applied to

Her Modus Operandi.

the purpose of retiring 200,000,000 of the notes. The method adopted was not direct redemption. The government deposited the gold in the Austro-Hungarian Bank and redeemed its own notes partly with bank notes and partly with new silver money which was needed to replace the small notes thus retired. In this way 200,000,000 florins of old notes were withdrawn and canceled before the end of the year 1897, leaving only 112,000,000 outstanding. When this was accomplished the value of the paper florin became very nearly equal to gold of the new standard. There is now no premium on gold in Austria-Hungary.

British India.

After many struggles with the double standard the single standard of silver was established in British India in the year 1835, the unit of value being the rupee. Prior to 1873 this coin was worth about 1*s.* 10¼*d.*, but was usually reckoned as the equivalent of 2*s.*, or 48 cents, the price of silver being about 60*d.* per ounce. With the gradual growth of commerce the inconvenience of silver, on account of its bulk and weight, became oppressive. Hence as early as 1859 the commercial classes of the country began to urge the government to adopt the gold standard, with silver as subsidiary, but nothing was done until 1893.

Petition for the Gold Standard.

On the 21st of June, 1892, the government of India transmitted to the home government a report and plan for currency reform prepared by Sir David Barbour, financial secretary of India. In this report it was considered impossible to establish in India a currency composed entirely of gold, yet the example of France and of other countries, which had the gold standard but maintained a large circulation of silver of full legal tender, pointed to the conclusion that the gold standard could be established in India without a large accumulation of gold. Sir David avowed himself a bimetallist in principle,

but in the event of a failure of the Brussels Monetary Conference he thought that an attempt should be made to establish the gold standard in India. The government of India requested permission to discontinue the coinage of silver for private persons. The subject was referred to a committee of seven, of which Lord Herschel was chairman. The Committee's labors extended over a period of seven months. On the 31st of May, 1893, it recommended that the request of the government of India for permission to close the mints against silver, retaining the right to coin rupees on government account, be granted. In order, however, to guard against any sudden and large advance in the value of the rupee on account of its scarcity, it was recommended that the government should announce that it would give rupees for gold at the rate of 16*d.* per rupee and would receive gold for taxes at that rate. The recommendations of the Committee were approved by the home government and were promulgated by the government of India on the 26th of June, 1893. The first effect of the closing of the Indian mints was a heavy fall in the price of silver. The price at the beginning of June, 1893, was 38¾*d.* per ounce. After the announcement was made it fell to 27½*d.* The price of rupees fell gradually to 13*d.*, but rose during the next five years to 16*d.* As the quantity of rupees in circulation could not be increased, they began to have a "scarcity value." In other words, the demand for them, due to the growth of business, exceeded the supply, and raised the price to 16*d.*

The Herschel Commission of 1893.

In March, 1898, a committee of thirteen, with Sir Henry H. Fowler, M.P., at its head, was appointed by the Anglo-Indian government with a view to the completion of the policy initiated in 1893. The Committee made a report July 7, 1899. It said that it was deemed important to assure

the world that India was not to take any backward step from the position already assumed. Events had been, on the whole, propitious since 1893, the value of the rupee having risen by reason of its scarcity to 16*d.* and remained stable within the ordinary fluctuations of exchange. Inasmuch as the public had come to regard 16*d.* as the par value of the rupee, and since business had adjusted itself to that ratio, it was deemed best to maintain it.

Fowler Committee of 1898.

Gold was made legal tender in India by Act 22 of 1899, at the rate of fifteen rupees to the sovereign. In the budget statement issued at Calcutta in March, 1900, it was said that the government has accumulated upwards of £8,000,000 in gold, and that it intended to retain not less than £5,000,000 as a permanent reserve. It is believed that the rupee can be maintained at par without any large accumulation of gold in the Treasury.

Prior to 1897 Japan had the double standard in law but the single silver standard in practice. She had been under the régime of irredeemable paper from 1873 to 1886. In the latter year she had resumed specie payments in silver. The decline in the price of that metal and the consequent disturbance of the foreign exchanges induced the government, in 1893, to appoint a commission to make inquiries concerning the coinage system and the monetary standard. This commission remained in session twenty-two months. It made its report in July, 1895, a majority of the members recommending the adoption of the single gold standard.

Japan adopts the Gold Standard.

The war between China and Japan took place the same year, and the Chinese indemnity fund, equal to £38,000,000 sterling, put in the hands of Japan the means to carry this monetary reform into effect with very little delay. It was stipulated in the treaty of peace that the indemnity should

be paid in London in English money. The law to carry the reform into effect was passed in May, 1898.

Her New Coinage Law.

At that time the market ratio of silver to gold was about 32 to 1. The gold yen of the old coinage was in circulation as commercial money and was worth about double the value of the silver yen. It was decided to make the gold yen the unit of value, and to make it approximately equal to the value of the silver yen at that time. For convenience in reckoning, and in order to keep the gold yen of the former coinage in circulation, the new yen was given exactly one-half the metallic content of the old one. The fineness is nine-tenths. The weight of the ten-yen piece is 8.3333 grams, and its value is $4.98. The gold pieces authorized to be struck at the mint are those of 5, 10, and 20 yen. All gold coins were made unlimited legal tender, the old yen to circulate at double the value of the new. The government receives and coins without charge all gold of standard fineness brought to the mint at Osaka.

The coinage of silver for private persons was discontinued. It was provided that each silver yen of the old coinage should be redeemed with a gold yen of the new coinage if presented before July 31, 1898, and after that date be regarded as bullion only. The new silver coins authorized are pieces of 50 sen, 20 sen, and 10 sen, the sen being the hundredth part of a yen. Silver coins are legal tender for 10 yen only. There are also small coins of nickel and bronze called "rin," which are legal tender for one yen. The rin is the tenth part of the sen.

The coinage law of Japan contains a provision that if, in consequence of abrasion from circulation, any of the gold coins fall below the minimum circulating weight, the government shall exchange such coins for others of the same face value without making any charge. In other

words, the government insures its gold coins against loss by ordinary wear.

The whole amount of one-yen silver coins redeemed under this law was 75,093,822 yen. Of this sum 25,567,011 was set apart for minting new subsidiary silver coins, and the remainder was sold at Hong Kong, Shanghai, and elsewhere.[1]

Russia suspended the coinage of silver for private individuals on the 9th of September, 1876. Prior to that time she had had the single silver standard nominally, but had been under the régime of irredeemable paper. This paper was quoted in terms of gold in all transactions of any magnitude. In other words, gold was in practice the standard of the Russian mercantile classes. The value of the legal-tender notes was measured in it from day to day. The gold imperial was in circulation as commercial money. Its normal value was 10 roubles 30 copecks in paper. When the price of silver had declined so that 10 roubles 30 copecks of paper would buy silver bullion which would yield a greater sum, by coining at the mint, the government suspended the free coinage of that metal and set its face toward the gold standard. Various steps were taken to this end at different times during the succeeding twenty-three years. They culminated in the law of June 7 (19), 1899, by which the gold standard was definitely adopted.

Russia adopts the Gold Standard.

It was decreed that the ratio between the old currency rouble and the new gold rouble should be as $1\frac{1}{2}$ to 1, and that this rating should apply to all past contracts, public and private. A person owing 150 roubles could pay the debt with 100 roubles after the resumption of specie pay-

[1] See report on the adoption of the Gold Standard in Japan, by Count Matsukata Masayoshi, Minister of Finance, Tokio, 1899.

ments, but these would be gold roubles. This act has been severely criticised, as though it were equivalent to repudiation of one-third of all debts. On the contrary, if the single silver standard had remained in force, all debts would have been scaled down 50 per cent or more, instead of $33\frac{1}{3}$ per cent. A debt of 150 roubles could in that case have been paid with 75 gold roubles or less.

New Russian Coinage Law.

The gold rouble was made the monetary unit of the empire, containing 17.424 doli (about 12 grains) of fine gold. The smallest gold coin, however, is the five-rouble piece, containing 87.12 doli (59.7413 grains) of fine gold. Gold pieces of 5, $7\frac{1}{2}$, 10, and 15 roubles are to be struck. The imperial, of fifteen roubles, is equal to $7.718. All gold brought to the mint either by the government or by private individuals is to be coined. The standard of fineness is $\frac{9}{10}$. Gold coins are legal tender without limit. Silver and copper are coined only for the government. Silver roubles and half and quarter roubles are legal tender for 25 roubles in one payment. Smaller silver and copper coins are legal tender for 3 roubles only. The rouble is divided into 100 copecks. The smallest silver coin is 5 copecks.

Mexico adopted the gold standard in 1906.

During the last quarter of the nineteenth century three international conferences were held, the declared object of whose promoters was to secure the adoption of bimetallism, or the double standard, by the nations participating. They were held in the years 1878, 1881, and 1892 — the first and second at Paris, the third at Brussels. The first and the third were called at the instance of the United States;

International Monetary Conferences.

the second, at the instance of the United States and France jointly. All of them failed to agree upon any plan to accomplish the object sought. Notwithstanding these repeated failures, President McKinley, in 1897, appointed a commission of three persons, of whom Senator Wolcott of Colorado was the chief, to visit Europe and endeavor to promote international bimetallism in some form. The commissioners met with some encouragement in France. They then went to England and sought to secure the aid of the Salisbury ministry, who at first seemed inclined to coöperate, but when facts of the negotiation became generally known, the business community both in the United Kingdom and in India protested so strongly against it that the whole project was abandoned.

The first essential of an international agreement would be to express in figures the legal ratio between the two metals, yet none of the conferences ever progressed so far as to discuss that subject. Any considerable deviation of the agreed ratio from the market ratio would bring powerful countervailing forces into play. If gold, for example, were artificially cheapened, less gold would be mined and greater quantities would be used in the arts, while the contrary effects would be felt in the production and consumption of silver.

Obstacles to Bimetallism.

The great obstacle to international bimetallism lies in the preference of mankind for gold money over silver money. If this preference did not exist, no international conference would be needed in order to put silver on an equal footing with gold. Even the most elaborate system of exchanges through banks and clearing houses leaves a residuum of payments to be made by the transfer of metal, and here the question of weight becomes decisive. A bank which has to receive $1,000,000 of metal will always prefer, say, 4000 pounds of gold rather than 140,000 pounds of silver. It can afford to pay

a premium for gold equal to the difference in the cost of handling and storing the two masses. The earliest sign of a premium on gold, after a bimetallic agreement had been made, would render the agreement itself inoperative.

RECAPITULATION

Inconveniences resulting from the use of two metals as standard money have led civilized nations successively to demonetize silver and to adopt the single standard of gold. These inconveniences were manifested for the most part in the exportation of one or the other metal, according as the market ratio varied from the legal ratio. The change to the single gold standard has come about within the past century, and mostly during the past thirty years. One reason why gold has been preferred to silver is that it contains much greater value than silver in a given weight and bulk, being thus akin to a labor-saving machine.

The demonetization of silver means the discontinuance of the coinage of silver bullion deposited at the mint by private persons.

In some countries there still remain large amounts of silver in circulation, of full legal tender, such as the thalers of Germany, the five-franc pieces of France, and the rupees of India. These pieces are usually at par with gold at some preëxisting ratio, because they are limited in amount and are received as the equivalent of gold by the governments for taxes. The banks have the legal right to tender these silver pieces in payment of checks, and in France and Germany they exercise the right at times, in order (as they say) to curtail the exportation of gold. In such cases there is a small premium on gold in the market.

Authorities

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BOOK II

GOVERNMENT PAPER MONEY

CHAPTER I

COLONIAL BILLS OF CREDIT

GOVERNMENT paper money is usually a promise to pay coined money. Such paper is of several different kinds. We shall here consider chiefly the kind which does not bear interest, which is payable at no fixed time, and which is made legal tender between individuals.

The first government paper to circulate as money in this country was issued by the Colony of Massachusetts in 1690, in order to pay soldiers who had returned from an unsuccessful expedition against Canada. The public treasury was empty, and the soldiers could not or would not wait for the collection of taxes to meet their demands. The General Court accordingly issued £40,000 in bills of credit which were made receivable for taxes and exchangeable for any commodities in the treasury. These were issued to the soldiers in anticipation of the tax collections; they were not payable at any particular time; they did not bear interest, and they were not legal tender. They did not pass for more than twelve or fourteen shillings in the pound. The soldiers lost two-fifths of their dues. In 1692 the bills were made legal tender in all payments and receivable for taxes at 5 per cent better than silver and redeemable in silver at the end of twelve months. These provisions made them equal to silver.

First Bills of Credit.

Yet this was a fatal experiment. Its apparent success as a means of postponing taxes led to disorders far worse than the commodity currency of the earlier period. It spread to the other colonies like an epidemic. Nearly all the colonial governors were at variance with their legislatures concerning bills of credit. Acting under instructions of the Lords of Trade, they repeatedly vetoed the paper-money bills. Then the legislatures refused to provide for the support of the local governments. They stopped the salaries of the governors and allowed the public buildings and barracks to go to decay. This source of irritation against the mother country has been grossly neglected by historians in general, but not by Mr. Felt, the historian of Massachusetts currency, who assigns it its proper place among the causes which led to the separation.

Strife with the Mother Country.

In South Carolina in 1719 the people deposed the Proprietors' governor, because he would not assent to bills of credit, and the king connived at this act of insubordination in order to get the province under his own authority. At a later period the legislature of this colony, being at variance with the royal governor on the same subject, adjourned for three years, making no provision for the support of the government meanwhile. The same thing happened in New Hampshire. Her representatives for five years preceding the year 1736 refused all supplies. New Jersey did the same for four years, for the same reason. The governors complained to the home authorities; and the latter insisted that the colonies should provide a permanent instead of an annual support for the local governments, which the colonies refused to do because they were not allowed a free hand in issuing bills of credit. In almost every case the governors were at last worn out and compelled to yield.

And with the Colonial Governors.

As Mr. Felt says, "The Briareus of paper money was too strong for them."

Petitions against bills of credit, from the mercantile classes in the colonies, and from London merchants at last prevailed on Parliament to take action. In 1751 a bill was brought forward to prohibit paper money in the four New England provinces where the trouble was greatest, but before it was passed the agents of the colonies managed to get exceptions in case of great emergencies and of war. Even in these cases the bills were not to be legal tender between individuals. In 1763 Parliament passed another act much more stringent, and applicable to all the colonies.

Prohibitions by Parliament.

A pamphlet of 1743[1] speaks of the bills of credit in New England issued on loan

> to themselves, Members of the Legislature, and to other Borrowers, their Friends, at easy and fallacious Lays, to be repaid at very long Periods; and by their provincial Laws made a Tender in all Contracts, Trade and Business, whereby Currencies, various and illegal, have been introduced which from their continued and depreciated nature in the Course of many Years have much oppressed Widows and Orphans and all other Creditors.

This writer gives special attention to the colony of Rhode Island, which had

> defrauded more in a few years than any the most wicked administrations in the several nations of Europe have done in several centuries. A contract made 30 years ago for £100 sterling in value (that is, silver at 8*s.* per oz.) is at present reduced to a nominal 32*s.* per oz. . . . This expedient of depreciating their Government bills, by their Laws made a Tender and Currency, is promoted by the

Rhode Island an Awful Example.

[1] Quoted in "A Letter from a Gentleman in Boston to his Friend in Connecticut." In the New York Public Library.

fraudulent Debtors and desperate part of the Colony in order to pay former contracts with a much less value than was contracted for, and more especially to defraud British merchants in their outstanding debts. The paper-money promoters are the desperate and fraudulent, these being vastly the Majority in the colony, carrying all elections; both legislative and executive parts of their government are annually elective. Thus Government is perverted and become worse than a State of Nature. If by chance any of the elected opposes the emission of any of those fraudulent bills he is drop'd next election as a professed enemy to the Interest of the Colony. . . . This poor small colony, from a late exact Perlustration, contains not exceeding 20,000 men, women and children, whites, Indians and negroes, have extant about £400,000 paper money. And of this about three-quarters is in the Possession of people of neighboring Colonies.

"All our paper-money-making legislatures," says the contemporary writer, Dr. Douglass, "have been legislatures of debtors, the representatives of people, who for incogitancy, idleness, and profuseness have been under the necessity of mortgaging their lands." To the same purport writes the historian, Hutchinson.

Thomas Paine has drawn the portrait of the group. Writing in 1786, he tells us how the speculators and debtors were then working for bills of credit. He says:

Testimony of Thomas Paine.

There are a set of men who go about making purchases upon credit, and buying estates that they have not wherewithal to pay for; and having done this their next step is to fill the newspapers with paragraphs of the scarcity of money and the necessity of a paper emission, then to have legal tender under the pretense of supporting its credit, and when out, to depreciate it as fast as they can, get a deal of it for a little price and cheat their creditors; and this is the concise history of paper-money schemes.[1]

[1] *Writings*, Vol. II, p. 178.

Usurers were then, as now, unpopular. Any means of circumventing them was hailed with satisfaction, and no method was more obvious than that of furnishing loans at the public treasury to those who could not borrow elsewhere, or who wanted to borrow at less than the market rates, or who wanted to borrow from the colony at low rates in order to lend again at high rates. Anybody who had influence could do this. In Rhode Island it was the custom of the favored ones to sell their privileges. The first issue of bills of credit for a loan was in South Carolina in 1712. From this example, says Bancroft, "the passion for borrowing spread like flame on a dry prairie."

Loans from the Treasury.

There were three main causes or excuses for the issue of bills of credit: (1) war expenses; (2) loans to individuals; (3) ordinary expenses of government. There were also other minor pretexts. One of the most common ways of increasing such issues was the alleged replacement of old and worn bills, which often meant an issue so large as to leave a margin over for general expenses, and sometimes a very large margin. Thus, of £46,000 Connecticut bills authorized for this purpose between 1713 and 1732, £29,885 went to the payment of colony debts. In this case the General Court did not wait to see what margin would be left after replacing the old and worn bills, but dipped into the reservoir to meet current charges. Similarly, Maryland once issued bills of credit as a sheer gift to a portion of the inhabitants, — "the taxables."

Other Pretexts for Bills of Credit.

Reports were made from time to time to the home government, in response to inquiries as to the amount of bills outstanding. Often these were ingeniously prepared to convey false impressions. To avoid discovery the New York Assembly repealed all safeguards against the reissuing

of bills of credit that had been redeemed. When the governor disallowed the act the treasurer reissued the bills nevertheless. The governor so reported to the Lords of Trade, and added that the treasurer refused to let him know the amount of bills outstanding when requested to do so.

False Reports.

In addition to legal-tender acts, there was a great variety of laws to compel people to sell their property at the same price for bills of credit as for silver. The "debtor class" were not satisfied with forcing depreciated paper upon creditors for past obligations, but insisted that they ought to be able to buy as much property with the paper as with specie. Those who had been forced to take the paper for past debts naturally joined in this demand, and the legislatures agreed with them. Hence we find in nearly all the colonies severe penalties on those who charged more for their goods, lands, or services in bills of credit than in money. In some cases the penalty was a fine, in others imprisonment, in others confiscation of the property offered.

Forcing Laws.

The usual course of events where bills of credit were issued was as follows: (1) emission; (2) disappearance of specie; (3) counterfeiting; (4) wearing out of bills; (5) calling in and replacing worn and counterfeited issues with new ones; (6) extending the time for old ones to run, especially those which had been placed on loan; (7) depreciation; (8) repudiation of early issues in part and the emission of others, called "new tenor."

Usual Career of Bills of Credit.

Dr. Douglass says that Massachusetts had at one time "old tenor, middle tenor, new tenor first, new tenor second." Rhode Island had an indefinite number of tenors.

In all cases, except where the bills were placed on loan, taxes were laid to sink them at some time, near or remote.

This was necessary to give them any credit at all, but it was very easy to extend the time. Consequently postponements were frequent. When Parliament took hold of the subject, it prohibited all extensions and deprived the bills of their legal-tender character after the allotted time had expired. This was regarded as a great grievance. The New York Legislature even resolved that bills not tenderable were useless.

Extending Time for Redemption.

Counterfeiting and wearing out were invariable and very trying evils. The former was punishable with death in all the colonies except one or two, — Bronson says in all except Connecticut, — but, although there were many convictions, the extreme penalty was hardly ever enforced. The expulsion of specie which followed after the first emission of bills of credit usually left the people without small change. Then the practice of halving and quartering the bills came into vogue, and this opened a new door to fraud. The counterfeiters halved and quartered their own bills and united the parts to the corresponding parts of genuine ones and sometimes attached the half of a five-pound note to the half of a ten. There was, indeed, no end to their tricks. Some bills of small denominations circulated after they were known to be counterfeit, because there was no other small change.

Counterfeiting.

Worn-out bills likewise were an ever-recurring nuisance. All sorts of opprobrious epithets were heaped upon them. They were called, in various statutes, old, worn, torn, tattered, shattered, ragged, mutilated, defaced, obliterated, illegible, and "unfit to pass."

The depreciation of the colonial bills varied in the different colonies. In Massachusetts the maximum depreciation was 11 for 1 (the standard being "proclamation money"). In Connecticut it was 8 for 1. In 1763 the value of the New Hampshire shilling was a little less than a half-penny; in

1771 it vanished altogether. Rhode Island old-tenor bills in 1770 were worth 26 for 1. Those of North Carolina were 10 for 1; of South Carolina, 7 for 1. The bills of the middle colonies were kept within reasonable bounds, — a result due mainly to the stubbornness of their governors in resisting the legislatures and keeping the issues of bills within limits. The maximum depreciation in New York was only 25 per cent, in comparison with proclamation money.

Depreciation.

The pamphlets and records of the colonial period are filled with accounts of the distress and demoralization caused by depreciated paper made legal tender. As all loans were so payable, the accumulations of age and the inheritances of orphans dwindled. So, too, did the earnings of the wage-worker. In order to avoid the losses from a depreciating standard of value, resort was had by workingmen to "store pay," and here they were generally cheated. Trustees and executors who had money in their hands which belonged to other people, and who saw how things were going, often postponed payment on frivolous pretexts, since each delay enabled them to settle their accounts with less value, thus "devouring widows' houses."

Swindling.

Not only was bad blood stirred up by the resistance of the royal governors, but a spirit of lawlessness was engendered against the local assemblies if they showed a disposition to resist the demands of the greenbackers of that day. Even after the Revolution the Legislature of New Hampshire was mobbed because it refused to issue legal-tender bills. One of the demands of Shays' rebellion in Massachusetts was for more paper money.

Mob Law.

In Rhode Island after the Revolution a general system of repudiation of debts, public and private, was undertaken and carried through by means of legal-tender paper, in spite of the decisions of her courts.

Repudiation.

Now it may be asked what happened when colonial bills of credit were issued as loans to private individuals. What the borrowers wanted was circulating capital. They borrowed the bills in order to spend them for store goods, provisions, building materials, labor, etc. The wages they paid to laborers were expended for store goods, provisions, etc.; so we may say that the borrowers of the bills of credit aimed to get control of the useful things that were on sale in the community, and that they succeeded in doing so. Now, whether the bills depreciated or not, it is evident that the borrowers got an advantage over their neighbors, because they obtained control of this circulating capital at lower rates than others had to pay. This was precisely the reason why they wanted the loan bills to be issued. If they could have borrowed at the same rate in the open market, there would have been no reason for borrowing from the government. But the injustice did not stop there. Whatever they took out of the loan market in this way caused a scarcity, and a rise of the rate of interest, for other borrowers. One of the most observing pamphleteers of the day tells us that the rate of interest on "natural loans" always advanced after a public loan. This was due in part to the withdrawal of loanable capital, and in part to the fear of lenders that the bills would depreciate in consequence of the new emission. Most commonly they did depreciate.

Economic Effect of the Loan Bills.

The borrowers were for the most part landowners. Only two kinds of security were allowed by law, land and bullion. Very little bullion was ever offered at the loan offices. The landowners controlled the legislative assemblies everywhere. Thus the emission of bills of credit on loan was, in effect, a conspiracy of needy landowners against the rest of the community.

A Conspiracy of Landowners.

RECAPITULATION

Most frequently the issue of legal-tender notes has its beginning in an emergency of war, when the government finds itself unable to meet its obligations with money, or hopes to escape paying the rate of interest demanded for loans.

Such paper is usually put in circulation by the government paying it to its creditors as the equivalent of specie, and authorizing them to pay it to their creditors, and so on.

Such were the conditions under which colonial bills of credit were first issued in this country. Afterwards the practice of issuing them for the ordinary expenses of government was adopted, and still later the colonies issued such bills as loans to private individuals.

In all cases the bills depreciated more or less. In some instances their value fell to zero and they were repudiated in whole or in part. In others the depreciated bills were followed by fresh issues called "new tenor," which depreciated in like manner, and were succeeded by third and fourth "tenors," which took the same downward course.

This teaches us that a popular government, when once started after the *ignis fatuus* of irredeemable paper, cannot readily stop itself.

The effect of a depreciating currency is similar to that of clipped coin. If all the money in the country were metallic, if each man, upon receiving a piece, should be privileged to shave off one per cent before passing it, and if the law required everybody to accept the remainder at its face value, the consequences would be like those which followed the emission of colonial bills of credit. In the course of time the whole coinage would be reduced to a fraction of its original weight. If the rulers of the people should then decree that the pieces should pass only for their metallic

value, and that new coins should be struck at the mint of full weight, but that clipping might go on as before, we should have old tenor and new tenor just as they had in New England in the eighteenth century.

There is one difference, however, in favor of clipped coin. Nobody loses anything by merely holding it. Nobody can shave off any part of it except the owner. In the case of a depreciating currency, the longer one keeps it the more he loses.

The colonial bills of credit were always made receivable for taxes. Generally the laws provided that they should be sunk by taxes within a specified time, meaning that they should all be taken in by taxation or redeemed with the proceeds thereof, within the specified time, and then be canceled. If these provisions and promises had been adhered to, the disorders in the currency would have been much less serious than they were, but the importunity of debtors was always influential with the legislative assemblies. In order to postpone payment of their debts to the government they persuaded the government to postpone payment of its debts to the bill-holders by extending the time for redemption and even adding new bills before the old ones had been retired.

If no more bills had been issued than could be sunk by taxes within one year, and if the law to this effect had been rigidly enforced, the evil consequences would have been slight.

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CHAPTER II

REVOLUTIONARY BILLS OF CREDIT

Bad as the colonial bills of credit were, those of the Revolutionary period were worse. Our ancestors went to war without any preparation. They had no money. They had no system of taxation. They had no central authority capable of enacting and enforcing one, and — what was even worse — they objected to being taxed either by Great Britain or by their own local governments. All the separate colonies began to issue bills of credit, even before the Continental Congress assembled.

Nevertheless, the experience of the past had not been wholly forgotten. Even Franklin, who had been an advocate of government paper in earlier times, now recoiled. When the first paper money was proposed in the Continental Congress (June, 1775) he urged that the bills should bear interest, in order to prevent depreciation. When the second issue was proposed, he urged that Congress should borrow on interest the bills already authorized. Both of these plans were rejected. The third issue bore interest, and now Franklin urged that the interest should be payable in "hard dollars." This was voted to be impracticable.

Franklin's Warning.

There was much confusion of ideas concerning details. While taking time to consider them, it was voted in July, 1775, to issue due bills for two million Spanish milled dollars, to be sunk by taxes in four successive years, beginning November 30, 1779, the taxes

First Issues.

to be levied and collected by the states in proportion to their population. The bills were not legal tender. The Congress had no power to make them legal tender, but in January, 1777, it recommended that the states should do so; and this they did, one after another, in one way or another. Before the two millions were issued, another million was wanted and was authorized, together with three millions more before the end of the year. Nine millions more, or fifteen in all, were out before independence was declared. This was called "continental" currency, to distinguish it from the issues of the separate states.

From this time the demon of "fiat money" had possession of the country and worked its will on the inhabitants. The issues ran on, in an increasing volume, till they amounted to two hundred and forty-two million dollars in the year 1779. In 1781 the whole mass became worthless.

Pelatiah Webster.

On this subject the essays of Pelatiah Webster have become classic. Mr. Webster was a merchant of Philadelphia and an ardent patriot. He wrote while the paper-money experiment was going on. We can readily believe him when he says: "We have suffered more from this than from every other cause of calamity; it has killed more men, pervaded and corrupted the choicest interests of our country more, and done more injustice than even the arms and artifices of our enemies."

Early Depreciation.

In his first essay (October 5, 1776) Mr. Webster says that he cannot discern any depreciation as yet, or any advance in the prices of goods beyond what a state of war would occasion, even if the currency consisted of gold and silver exclusively. On the other hand, Professor Sumner has collected evidence showing that at some places goods were sold at lower prices for silver than for bills, even before the Declaration was

signed.[1] It is certain that committees were at work early in 1776 attending to the cases of persons who discriminated against paper money. The most common punishment for this offense was seizing some portion of the offender's goods and declaring him an enemy of his country. That this was no trifling penalty is attested by the fact that nearly every one recanted and promised amendment. Nevertheless the number of offenders increased continually. In Philadelphia, in the latter part of 1776, one of the penalties was the closing of the shops of the guilty parties. This caused prices to rise by giving a monopoly to the others; and so, when this effect was observed, the first culprits were allowed to reopen.

Early in 1777 the depreciation had become too great to be ignored. Committees were appointed in nearly all the states to prevent engrossing and forestalling.[2] One way to do this was to buy all the goods of a particular kind in sight for the army and to require the owners to accept continental money for it. This involved the necessity of deciding how much the owners were entitled to retain for their own use or to meet engagements previously made. It was necessary also to fix the rate of wages of labor for reproducing the goods. At a later period the depreciation was so rapid that Professor Sumner says a man might lose his whole wages while earning them.

Price conventions were the next resort. The first one, held at Providence, was composed of delegates from the four New England states. It fixed the prices at which

[1] There are several histories of the continental currency. That of Professor Sumner, in his *Financier and Finances of the American Revolution*, is much the best. Mr. A. S. Bolles, in his *Financial History of the United States*, has been an industrious collector of facts.

[2] Forestalling is buying goods before they reach the market, in order to sell them at a higher price. Engrossing is the same as monopolizing.

imported goods might be sold, but an exception was made of arms and ammunition in order to encourage their importation. Retailers were not to charge more than 20 per cent advance. The regulation of prices of domestic products was left to the states, as was also the penalty for over-charging. Rhode Island enacted, in addition to other penalties, that if anybody withheld from sale any goods required for the army or navy, the state officers might seize them and, if necessary, break open buildings. A little later it was enacted that buildings containing any goods needed by the community and withheld by the owners might be broken open and the contents sold at the statutory prices. An exception was made of salt, as being, like arms and ammunition, an indispensable article. The effect of these laws was to discourage importation. Nobody would bring in goods to be exposed to legal pillage. Accordingly the Rhode Island laws against engrossing were repealed after a few months. The course of proceedings in Connecticut was substantially the same. This state, however, had a law to prohibit persons from buying any more goods than the selectmen should judge to be necessary for the use of their respective families. Anything like prudence in laying in supplies was thus forbidden.

Price Convention in New England.

Burglary legalized.

A price convention of the six Middle States was held at York, Pa., in March, 1777, but was unable to agree upon a single point. Three states voted that maximum prices should be fixed, that sales by auction should be forbidden, and that importation (which had fallen off, in consequence of the disorderly proceedings of committees) should be encouraged by bounties. Three voted against these propositions, believing that they would only aggravate the evils. The subject was accordingly referred back to the states,

Price Convention of the Middle States.

but the execution of the price-limiting laws was oftener carried out by mobs than by the constituted authorities. In Albany two persons who had sold rum for more than the established price were taken to the market place and put on a scaffold, when they fell on their knees, acknowledged themselves guilty, and promised to observe the law and help to enforce it upon others. Every method of evasion, such as trade by barter, subjected persons to suspicion. Thus, Richard Henry Lee, who commuted his rents to payment in produce, was denounced as a Tory and left out of Congress at the next election.

Mr. Webster, in one of his essays, said that not more than one man in ten thousand was capable of understanding the subject. The greatest man of the period did not understand it; for Washington wrote to Reed, the president of Pennsylvania, December 12, 1778, commending his zeal "in bringing those murderers of our cause, the monopolizers, forestallers, and engrossers, to condign punishment. It is much to be lamented," he continued, "that each state, long ere this, has not hunted them down as pests to society and the greatest enemies we have to the happiness of America. I would to God that some one of the more atrocious in each state was hung in gibbets upon a gallows five times as high as the one prepared by Haman." Yet he had written, more than a year earlier (September 28, 1777), to John Parke Custis, directing him to see that the rent of certain land and slaves should be so arranged that the payments should have a value relative to the currency. "I do not mean by this," he says, "that I am unwilling to receive the paper money. On the contrary, I shall with cheerfulness receive payment in anything that has currency at the time of payment, but of equal value then to the intrinsic worth at the time of fixing the rent." Only two months before he wrote

Washington's First Views.

to Reed about hanging monopolizers, forestallers, and engrossers, he wrote (October 10, 1778) to Custis, advising him not to accept money for a piece of land he was about to sell, but to take other land in exchange for it, because the money might lose its value. This was just what the monopolizers, forestallers, and engrossers apprehended.

Washington was an honest man. It never occurred to him that he was doing with his land and slaves exactly what the others were doing with their provisions and store goods. But, a year later, his eyes were wide open. In August, 1779, he wrote to his agent, Lund Washington, that he would no longer accept continental money on contracts made before the war, unless other people did the same. "The law," he says, "undoubtedly was well designed. It was intended to stamp a value upon, and to give a free circulation to the paper bills of credit, but it never was nor could have been intended to make a man take a shilling or sixpence in the pound for a just debt, which the debtor is well able to pay, and thereby involve himself in ruin."

Subsequently changed.

When the Father of his Country could make such mistakes, we need not wonder that the common people were befogged. Washington here says that it was merely intended by Congress to "stamp a value" upon certain pieces of paper. If value can be stamped upon paper, it is obviously useless to work for a living. All that is required to insure plenty and prosperity is to pass a law, and then set a few printing presses at work. If Congress attempts to stamp a value upon a thing that is intrinsically worthless and fails in the attempt, its intentions may form a subject of curious interest, but they are of no practical importance.

After the Revolution and to the end of his life, Washington was an inflexible opponent of bills of credit, and he had need to use all his influence against that form of debauchery in Virginia.

With the mass of the people nothing could be done. All of them, the wise and unwise together, were hurrying to a cataclysm.

The Final Cataclysm.

The fatal error (says Pelatiah Webster), that the credit and currency of the continental money could be kept up and supported by acts of compulsion, entered so deep into the mind of Congress and all departments of administration through the states that no considerations of justice, religion, or policy, or even experience of its utter inefficiency could eradicate it. It seemed to be a kind of obstinate delirium, totally deaf to every argument drawn from justice and right, from its natural tendency and mischief, from common sense and even common safety. This ruinous principle was continued in practice for five successive years, and appeared in all shapes and forms, *i.e.*, in tender acts, in limitations of prices, in awful and threatening declarations, in penal laws with dreadful and ruinous punishments, and in every other way that could be devised, and all executed with a relentless severity, by the highest authorities then in being, *viz.*, by Congress, by assemblies and conventions of the states, by committees of inspection (whose powers in those days were nearly sovereign), and even by military force; and though men of all descriptions stood trembling before this monster of force, without daring to lift a hand against it, during all this period, yet its unrestrained energy ever proved ineffectual to its purposes, but in every instance increased the evils it was designed to remedy, and destroyed the benefits it was intended to promote; at best, its utmost effect was like that of water sprinkled on a blacksmith's forge, which indeed deadens the flame for a moment, but never fails to increase the heat and force of the internal fire. Many thousand families of full and easy fortune were ruined by these fatal measures, and lie in ruins to this day, without the least benefit to the country, or to the great and noble cause in which we were then engaged.

When the price conventions failed of their object, new ones were held fixing new limits, — as, for example, fourfold

the prices of 1774, then eightfold, then tenfold, then twenty-fold, — terrorism being applied in each case to enforce the decrees. Country folks accused town folks of extortion, and threatened to come in and take what they wanted by force. Town folks accused country folks of withholding their produce. Laws were enacted against withholders. Anonymous handbills and broadsides were circulated, threatening vengeance on merchants. Turmoil was everywhere. Society was like a train of Eskimo dogs when the driver hits with the whip the leader, which turns and falls upon the dog behind him, and presently the whole pack are piled together in battle, not one knowing what it is all about. As a result of such irrational business disturbances Boston was, in October, 1779, on the verge of starvation; money transactions had nearly ceased, and business was done by barter.

Social Terrorism.

In May, 1779, two regiments of Connecticut troops revolted on account of their bad pay. In January, 1781, the Pennsylvania line broke into mutiny for the same reason and killed a captain who tried to bring them to submission. A soldier's pay had dropped by depreciation from $7.00 per month to 33 cents, although it had been twice raised by Congress. Washington could not move his soldiers to Yorktown till Robert Morris had borrowed hard money from Rochambeau for their back pay.

Mutiny of Soldiers.

In March, 1780, Congress tried the colonial experiment of "new tenor" in a very awkward and roundabout way, and declared old tenor to be worth 40 for 1, the actual depreciation being 60 for 1. As it was supposed that $200,000,000 of continental money was now out, this was a repudiation of all but $5,000,000 of it. The depreciation then went on more rapidly than before. The new-tenor bills started at a depreciation of 2 for 1, which became 3 for 1 before they reached the army

"New Tenor."

and dropped to 6 for 1 in a few months. Old tenor went at a galloping pace down to 500 for 1 in Philadelphia, when it ceased to circulate. In the remoter districts of the South it continued in circulation nearly a year longer, and until the depreciation had reached 1000 for 1. The Southern people, when they learned that they had been using the stuff long after it had become worthless in the North, thought that they had been cheated by the Yankees, thus intensifying the sectional distrust which was already so dangerous.

Counterfeiting.

Counterfeiters had been at work all the time and with so much success that Congress was obliged to call in the entire issues of certain dates and declare them uncurrent after a fixed period. The issues thus branded fell 25 per cent as compared with those not branded. Still, counterfeiting only hastened the impending crisis, and in that respect it was a public advantage; for, as soon as paper money was dead, hard money sprang to life, and was abundant for all purposes. Much had been hoarded and much more had been brought in by the French and English armies and navies.

Specific Supplies.

When the paper had become clearly unmanageable, early in 1779, Congress bethought itself of specific supplies as a means of feeding the army. Under this plan requisitions were made upon the states for beef, pork, flour, corn, forage, etc. Contrary to expectation, this was found to be the worst device of all, since it called for a vast new system of transportation, warehousing, and accountability, and opened the door to innumerable frauds. Robert Morris, the Superintendent of Finance, protested against it in the beginning as the most wasteful method of supplying the army, but his protest was unheeded. Nothing would open the eyes of Congress but an experiment. Instantly there was a tangle of the public accounts which nobody could unravel. In some cases flour

collected for the army was not forwarded because there was no money to pay teamsters, but it remained at the place of collection till it was spoiled. Other consignments which were actually sent arrived too early or too late and were left on the ground exposed to the weather. Cattle forwarded for beef were allowed to wander away. Collections were made and not reported. In August, 1780, Washington was obliged to send word to a body of militia, who were about to march to his aid, not to come, because he could not feed them. Communicating this fact to Congress, he said, "The present mode of obtaining supplies is the most uncertain, expensive, and injurious that could be devised." He said that it had made impressment necessary, and that impressment could not last long. Many of General Greene's soldiers could not leave their tents because they had no clothes. This experiment of specific supplies was an attempt to carry on government without any medium of exchange. It was a complete failure.

A Complete Failure.

Impressment, somewhat disguised, had been resorted to from the time when continental money began to depreciate. To seize a man's goods and tender him irredeemable paper, at a rate which would not enable him to replace the goods, was confiscation of the difference between the value of paper and that of specie. All the price conventions were, in fact, impressment conventions under another name. Congress recommended the impressment of horses and wagons "at a reasonable rate" as early as 1775. This method of securing supplies was not unknown to the colonies. New York had resorted to it in the old French wars, and South Carolina in her Indian wars. Lists of articles impressed, with the prices attached, are of frequent occurrence in colonial statutes. These, however, implied payment in full measure, not long deferred.

Impressments.

When the continental money began to depreciate rapidly, impressments became more frequent. In Pennsylvania so many horses and wagons were impressed that the country people stopped bringing fuel to the towns. This led to an exception, by the Council of Safety, of teams engaged in hauling wood or provisions. In Virginia impressments were so numerous that the people sent their teams over the mountains or into North Carolina for safety. Others made a practice of removing and hiding a wheel or some other indispensable part of a wagon, so that it might be useless when the impressing officers came. When Washington arrived in camp at Yorktown, ample supplies of bacon had been collected and stored for the army, south of the James River, but they could not be moved because the impressing officers could not find any teams to haul them, in the oldest settled part of America. Teamsters who had been impressed threw out their loads at the wrong places. Others ran away with them and did not return. Hamilton wrote to Greene that public credit was so totally lost that nobody would furnish aid, even in the face of impending ruin. All this was at the very crisis of the war, while the fleet of De Grasse was sailing into Chesapeake Bay. But for that fortunate conjuncture the war could not have been continued, so greatly had the people been alienated by bad money and the harsh treatment which it led to.

Also a Failure.

In May, 1781, Congress recommended that the states should repeal their legal-tender laws. Some of them had already done so, and now the rest followed suit. All of them adopted "scales of depreciation" for the settlement of debts. These were tables showing how much the money was worth in specie at various times and how disputed accounts should be settled. The tables were notoriously incorrect. The one

"Scales of Depreciation."

recommended by Congress placed the currency at par in September, 1777, whereas it was worth at that time only 33 cents on the dollar. New confusion and new wrongs were introduced by the new policy. "The courts could not do justice," says Professor Sumner, "because depreciation introduced a fraud into the very essence of the case, and the agent of the fraud was almost always innocent, so far as his intention was concerned. If, therefore, the court undertook to release the victim of the fraud from all effect of the fraud, the injury was simply thrown back on the perpetrator, who, being innocent, suffered as much wrong as the victim would have suffered if nothing had been done."

Continental money was now an object of execration and afterwards of derision. "Not worth a continental" became a synonym for absolute worthlessness. In the act of Congress approved August 4, 1790, authority was granted for funding the bills in 6 per cent bonds "at the rate of one hundred dollars in the said bills for one dollar in specie." Only $7,000,000 turned up to take advantage of this provision.

"Not Worth a Continental."

When the final catastrophe came, some of the wise men of the period exclaimed that the continental money was simply a form of taxation, and that it had been paid and canceled. Franklin consoled himself with this idea, saying that the bills clothed and fed the army and that they operated as a tax, bearing most heavily on the rich, as was proper, since the rich had the most money. Strange that so great a man could have been so deceived! If the continental money was a tax, it did not bear heaviest upon those who had the most, but upon those who kept it longest. Those who had money due them at fixed times and could not hasten the payment were *taxed*, not in proportion to their wealth, but in proportion to the time the debts had to

Continental Money considered as a Tax.

run. All who depended upon regular interest payments — and most of the charitable and educational institutions of the day were in this category — were taxed at various rates up to 97½ per cent of their entire income. It is a complete subversion of ideas to call this a tax.

The word "tax" is from the Latin *taxare*, to value or to appraise. It presumes a methodical arrangement of the taxable persons so that justice shall be done and each shall know what he has to pay. Taxation is the opposite of confiscation. It was adopted in order that confiscation might be avoided. Confiscation, however, has the merit of enabling the government and people to know how much has been taken, and from whom, so that when more propitious times come, or a higher sense of justice prevails, restitution may be made. The kind of confiscation or taxation that continental money produced was hurly-burly. The government plundered right and left, and, instead of keeping an account of persons and things, it told the victims to rob the next ones they came to.

Or as Confiscation.

A euphemism which still lingers is that "the continental money fell gently asleep in the arms of its last possessor." A truer figure of speech would be that it passed out of the world like a victim of delirium tremens.

It may be asked what else could have been done. If the continental money was a disguised tax, certainly an undisguised one would have been better. What the government required was army supplies. These were partly the products of the country and partly imported, the latter being paid for with the products of the country. The people did not avoid the necessity of parting with their products by the device of issuing paper money. Except what was borrowed and begged abroad, the whole cost of the war was paid by the thirteen states out of their annual produce. Therefore it was a question merely of

The Alternative.

how the contributions should be levied. Regular taxation is always better than confiscation, because it is more economical and because it conserves the public morals, the confidence of the citizens in their own government, and the respect of the world.

Display of Luxury during the War.

One of the striking phenomena of the Revolution was the great display of luxury. Franklin wrote in 1779: "The extravagant luxury of our country in the midst of all its distresses is to me amazing." Another writer says: "Every form of wastefulness and extravagance prevailed in town and country, nowhere more than in Philadelphia under the very eyes of Congress, — luxury of dress, luxury of equipage, luxury of the table."[1]

This is not hard to understand. If a man owed $1000 gold value and was enabled to pay it with $100, he had $900 disposable for other purposes. As this money had not come by hard labor, he would naturally be somewhat free in spending it. He would give good dinners, drive fast horses, and buy fine clothes and jewelry for his family. It was the transfer of property from frugal persons to spendthrifts. While it continued, it gave a deceitful appearance of prosperity. Like conditions prevailed during the Civil War, both North and South.

Post-Revolutionary Bills.

After the war seven states (Rhode Island, New York, New Jersey, Pennsylvania, the Carolinas, and Georgia) plunged into paper-money debauchery afresh. There were also severe struggles over the question in New Hampshire, Massachusetts, Maryland, and Virginia.[2]

[1] Greene's *Historical View of the American Revolution.*

[2] See the first volume of McMasters' *History of the People of the United States*, where these movements are well described.

RECAPITULATION

The Revolutionary bills of credit were of the same general character as the colonial bills which preceded them, except that they were issued only for war purposes.

To prevent depreciation it was deemed necessary to fix the prices of merchandise by law and to punish persons who should sell at higher prices for paper than for silver. Severe punishments were inflicted for this offense, but they did not stop or even retard the depreciation.

The bills eventually became worthless and were repudiated.

Many of the most patriotic families of that day were ruined by the use of these bills, without any benefit to the public cause.

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CHAPTER III

THE GREENBACKS

During the War of 1812 the government of the United States issued Treasury notes to the amount of $36,680,794. All except $3,392,994 were payable to order and payable at a definite time and bore interest at the rate of 5⅔ per cent. About two-thirds of them were of denominations of $100 or more. They did not become a part of the circulating medium and were not intended to. They were paid to such creditors of the government as were willing to receive them, and they were generally at par until specie payments were suspended in September, 1814. On November 12, 1814, Mr. Hall, a member of Congress from Georgia, introduced a bill in the House for an issue of Treasury notes to be legal tender. The House, by a vote of 42 to 95, and without debate, refused to consider this bill. No other attempt was made to pass a legal-tender bill until 1862.

Treasury Notes before the Civil War.

In the panic and crisis of 1837–43, during a portion of which time specie payments were suspended, the government issued Treasury notes to the amount of $47,000,000 to meet deficiencies of revenue. All of these notes bore interest and were payable at a fixed time. They did not become a part of the circulating medium. A few were issued by the Secretary of the Treasury in 1842 bearing only a nominal rate of interest (one mill per $100 per annum). Such notes had not been contemplated by Congress. The Committee of Ways and Means of the House, to

whom the subject was referred, reported that the Secretary had exceeded his authority, but Congress took no action on the report. It was the opinion of the Committee that these notes were "bills of credit" within the meaning of the Constitution and that Congress had no power to issue bills of credit. In 1847, during the war with Mexico, Treasury notes to the amount of $26,122,100 were issued. They bore interest at the rate of 5⅔ and 6 per cent. They did not enter into the circulation and were not intended to. The foregoing issues of interest-bearing Treasury notes were merely government loans, of which the securities were in small denominations and had only short periods to run.

When specie payments were suspended in 1814, and again in 1837, silver small change disappeared because it was worth more per dollar than the bank notes in circulation. On both occasions private notes and tickets of less denominations than $1.00, and copper coins, were issued and put in circulation by bridge, ferry, and turnpike companies and by tradesmen and manufacturers. One hundred and sixty-four varieties of private copper coins of the period of 1837 have been preserved in numismatic collections. Most of them bore the names of the issuers, who promised to redeem them.

Prior to the Civil War the fiscal operations of the government were transacted exclusively with coin, by its own officers, without the intervention of banks. In August, 1861, Mr. Chase, the Secretary of the Treasury, negotiated three loans of $50,000,000 each from the banks of New York, Boston, and Philadelphia. In anticipation of such loans, Congress had passed a law authorizing him "to deposit any of the moneys obtained on any of the loans in such solvent specie-paying banks as he might select," and to withdraw the same as required for the payment of public dues. The object of this law was to enable

War Loans of 1861.

him to leave the money in the banks as a deposit till wanted for actual disbursement, and then to withdraw it by checks, which would be settled at the clearing house. This was a discretionary power, and Mr. Chase decided not to make use of it. The bankers argued that the financial operations of the government could be best carried on by leaving their gold in their own vaults as the basis of credit. Against the strong opposition of the banks, he required them to pay their gold into the sub-treasury at New York at the rate of about $5,000,000 per week.

This policy does not appear to have had any harmful effect, except that of exciting the fears of the bankers themselves.[1] The public creditors, who received the gold, deposited it again in banks, where it became the property of the latter, like any other funds or securities among their assets. The largest amount of gold in the banks of the three cities at any time during the year was $63,200,000, August 17. On December 7 following, it was $58,100,000, although in the meantime they had loaned the government $100,000,000 and had agreed to loan $50,000,000 more. These loans had been largely, but not wholly, reimbursed to the banks by the sale to the public of the securities they received from the government.

Everything appeared to be going on well, but early in December,

two untoward events occurred. The first was the report of the Secretary of the Treasury. It had been generally felt that the plan of borrowing from the banks to carry on the war could be only a temporary makeshift intended to serve until a permanent

[1] In the first edition of this book I ascribed the suspension of specie payments in December, 1861, to the removal of the gold from the banks by Secretary Chase. An article on this subject by Mr. Wesley C. Mitchell, in the *Journal of Political Economy*, June, 1899, has convinced me that I attached too much importance to that action.

policy could be matured. It was hoped that the finance report in December would present a programme of adequate taxation. The disappointment over its failure to do so was keen, and the suspicion that the Secretary was not equal to his great task injured the credit of the government. The second event was the Trent affair, which threatened for a time to involve the Federal Government in a war with England.

The moral effect of these events was immediately seen. The credit of the government declined, so that it became impossible for the banks to sell the government securities, which they held to a large amount, except at a great pecuniary sacrifice. This cut off one source from which they had been obtaining specie. At the same time people became frightened, stopped depositing money in the banks, thus cutting off the other source. Even worse, the deposits began to be withdrawn and the specie reserve dwindled at an appalling rate. About twenty-seven million in specie were drawn inland from the New York banks in the month of December, by far the larger part of it in the last two weeks. It was all outgo now, and no income. The end was but a question of time. After standing the strain upon their reserves for two weeks, the New York banks were compelled, in order to save themselves from complete exhaustion, to suspend specie payments on the thirtieth day of December. Banks in other cities speedily followed suit. The suspension of the national Treasury was entailed as a necessary consequence of the suspension of the banks. Thus the first day of the new year 1862 saw the collapse of the whole scheme of national finance.[1]

Suspension of Specie Payments.

Among the various devices for raising money at the beginning of the war, was that of issuing non-interest-bearing Treasury notes in small denominations fitted to be used as currency. Sixty millions of these had been authorized before Mr. Chase negotiated the above-mentioned loans. These notes were payable on demand and were receivable

[1] Mr. Wesley Mitchell in the *Journal of Political Economy*, June, 1899.

for taxes and duties on imports, but were not legal tender. Mr. Chase was paying them to such of the public creditors as were willing to receive them, simultaneously with his disbursement of the gold drawn from the banks. Thirty-three millions were outstanding when specie payments were suspended. They were called "demand notes" in distinction from the subsequently issued legal-tender notes. The bill for the latter was first proposed by Mr. Elbridge G. Spaulding, a member of the Committee of Ways and Means, and was reported by the Committee by a majority of one vote on January 7, 1862. It authorized the Secretary of the Treasury to issue $150,000,000 of United States notes not bearing interest, payable to bearer, of denominations not less than $5.00 each. Fifty millions of these notes were to be in lieu of that amount of the demand notes aforesaid. The notes were to be receivable for all dues to the government and to be legal tender for all debts public and private within the United States and to be exchangeable for bonds of the United States bearing interest at 6 per cent, redeemable after five years and payable in twenty years. These bonds were familiarly known as the 5–20's.

The Legal-Tender Bill.

A delegation of bankers from New York, Boston, and Philadelphia came to Washington to remonstrate against the bill. A meeting was held at the office of the Secretary of the Treasury on January 11, at which these gentlemen and the members of the financial committees of the House and Senate were present. Mr. James Gallatin, in behalf of the bankers, presented a plan of national finance which would, in the opinion of those gentlemen, procure the means for carrying on the war without recourse to legal-tender notes. One of the proposals was to "issue 6 per cent twenty-year bonds, to be negotiated by the Secretary of the Treasury, and without

Bankers remonstrate against it.

any limitation as to the price he may obtain for them in the market."

Mr. Spaulding took ground at once against this plan. He tells us that he "objected to any and every form of 'shinning' by government through Wall or State Street to begin with; objected to the knocking down of government stocks to 75 or 60 cents on the dollar, the inevitable result of throwing a new and large loan on the market, *without limitation as to price.*"

In order to avoid selling government stocks at 75 or 60 cents on the dollar in an honest way, Mr. Spaulding initiated a policy which ended in selling those stocks at 40 cents on the dollar in a roundabout way, and cheating creditors, soldiers, and laboring men out of more than half their dues in an incidental way. This state of facts he mournfully acknowledges in his book, and he seeks to put on Mr. Chase the blame for too much inflation of the currency.[1] But the man who opens the floodgates has no right to complain of the inundation.

Although Mr. Chase, in his annual report for December, 1861, distinctly rejected the idea of legal-tender notes (which was already in the air), on account of "the immeasurable evils of dishonored public faith and national bankruptcy," yet on January 22 following, he wrote to Mr. Spaulding a qualified approval of his bill. The letter was not satisfactory to all the members of the Committee. Consequently a resolution was adopted, asking his opinion as to the propriety and necessity of the immediate passage of the bill by Congress.

Mr. Chase assents to the Legal-Tender Bill.

[1] "He [Chase] left the office with twice as much inflating paper outstanding as ought ever to have been issued, and with the promised dollar printed on the face of the greenback worth only 35 to 40 cents in gold." — Introduction to second edition of SPAULDING'S *Financial History of the War*, p. 11.

His answer was returned on the twenty-ninth. Much unnecessary verbiage was employed to convey the Secretary's assent to the legal-tender clause, but he gave his assent and added certain reasons for it which had not been advanced by anybody else. He said that some people gave a cordial support to the government by taking its notes at par, while others did not, — referring to the "demand notes" which were not legal tender. "Such discriminations," he said, "should, if possible, be prevented, and the provision making the notes a legal tender, in a great measure at least, prevents it by putting all citizens in this respect on the same level, both of rights and duties." This was very plausible. It appealed powerfully to the spirit of patriotism. But Mr. Chase was a victim of his own phrases. The *duties* of the citizen are to submit to the laws of conscription and of taxation, and his *rights* are to be exempt from impressment and confiscation. If others enter the army voluntarily or give their money to the government outright, those acts are over and above duties. They rise to the category of merits.

The bill passed the House, February 6, 1862, by 93 to 59. The legal-tender clause, however, narrowly escaped defeat in the Senate. On Mr. Collamer's motion to strike it out, the yeas were 17 and the nays 22. Senator Fessenden, the chairman of the Committee on Finance, spoke and voted against the legal-tender clause, but he did not oppose it vigorously. In any narrow division of the Senate his influence would have been decisive, if he had exerted it. But evidently he did not wish to be responsible for the defeat of the measure.

The Bill passes.

Two amendments of importance were added by the Senate: one making the interest on the government's obligations payable in coin; the other giving the Secretary of the Treasury authority to sell bonds bearing 6 per cent interest at any time, at the market value thereof, for notes

or coin. The latter clause was intended to enable the Secretary to obtain gold at some price, to pay the interest on the bonds. In the Conference Committee of the two houses an additional plan was devised for this end, by making duties on imports payable in coin.

The bill became a law on the 25th of February, 1862.

The Second Issue.

On the 7th of June Mr. Chase asked for $150,000,000 more notes. A bill for this purpose was passed with very little opposition. It provided that not more than $35,000,000 should be of denominations smaller than $5.00.

On the 6th of March Mr. Stevens introduced a bill authorizing the Secretary of the Treasury to dispose of any bonds or notes authorized by law, for coin, on such terms as he should deem most advantageous to the public interest. After the legal-tender act was passed it was remembered that $60,000,000 of demand notes were outstanding, which were receivable for customs duties. If duties should be paid exclusively in these notes, some considerable time must elapse before any coin would come in to meet the interest payments. Mr. Stevens said that it was impossible to sell bonds "at the market value," and that the Secretary of the Treasury had sent down this bill and wanted to have it passed at once. He concurred in the necessity of it since the coin amendment had been adopted by Congress, although that amendment was against his judgment. The bill was passed by the House on the following day, and by the Senate March 11, without a division. In the Senate it was amended so as to read as follows:

The Coin Purchase Act.

> The Secretary of the Treasury may purchase coin with any bonds or notes of the United States authorized by law, at such rates and upon such terms as he may deem most advantageous to the public interest.

In the Revision of the Statutes, which was completed in 1874, this clause was wisely retained among the provisions of law "general and permanent in their nature"; for, so long as the Treasury is responsible for the maintenance of parity between gold and paper, its power to obtain gold ought to be unrestricted.

When Congress assembled in December, 1862, it found that the most sacred obligation of the government — the pay of the army and navy — had not been met, and that great distress existed among the families of soldiers in consequence. Mr. Gurley, of Ohio, in the House (January 15, 1863) drew a most harrowing picture of the suffering in consequence of this default. The amount of pay overdue was $59,000,000.

Third Issue.

It is not possible to acquit Mr. Chase of responsibility for this default. The House passed a resolution asking why he had allowed the pay of the army to fall into arrears. He had power under the law to sell 6 per cent bonds at their market value for greenbacks or coin. Why had he not done so? His answer was in these words:

> The Secretary, solicitous to regulate his action by the spirit as well as the letter of the legislation of Congress, did not consider himself at liberty to make sales of the 5–20 bonds below their market value; and sales except below were impracticable.

What Mr. Chase meant was that the quoted value of 6 per cent bonds on a particular day — the 3d of January, 1863, for example — was 98 in currency. But if the Secretary should offer any large lot, the price would fall below 98. In other words, there was no market value for bonds, although there was a market value for every other merchantable thing under the sun. There was much feeling against Mr. Chase among congressmen, on account of this interpretation of the law which they had passed to meet every financial emergency.

The Secretary's scruples on this subject led to the third batch of legal-tender notes, $100,000,000, authorized by a joint resolution dated January 13, 1863, "for the immediate payment of the army and navy of the United States." The whole amount now authorized was $400,000,000. The price of gold at this time was 142; at the end of the month it was 159. Mr. Spaulding was surprised, at this juncture, to find that there was a great scarcity of currency. This he attributed, not to the advance in prices which had absorbed the additions to the circulating medium, but to the operations of the army and navy. He did not explain how the operations of a million men fighting and destroying property should call for more currency than those of the same number engaged in peaceful occupations at home.

Depreciation.

Two other kinds of legal-tender notes were issued during the war. They were called Treasury notes in contradistinction to the former ones, which were called United States notes, or popularly "greenbacks." On March 3, 1863, Congress authorized the issue of $400,000,000 of Treasury notes of denominations not less than $10, to run not more than three years, to bear interest not exceeding 6 per cent, payable in "lawful money," *i.e.*, in either gold or United States notes. They were to be legal tender for their face value, excluding interest. The object of this law was to obtain loans from small investors without making further additions to the currency. Anybody having $10 for which he had no immediate use could buy a Treasury note for that sum. He would be impelled to hoard it for the sake of the interest, but if necessary he could use it as money for its face value, in which case the payee would be impelled to hoard it.

Interest-Bearing Notes.

Under this act $44,520,000 of one-year notes and $166,480,000 of two-year notes, bearing interest at 5 per cent,

were issued. A portion of these notes had interest coupons attached to them, which could be cut off and collected as the interest matured. These were found to be troublesome, since they caused alternate contraction and expansion of the currency. When the accumulated interest was sufficient to make it worth while for the owner to keep them they would be hoarded, and when the coupon was cut off they would be put in circulation. They were paid off by the government and canceled as soon as possible.

Under this act there were issued also $266,595,440 of compound-interest notes to run three years. The rate of interest was 6 per cent, compounded semi-annually, and the interest was payable with the principal at maturity, and not otherwise. On the back of the note was a printed statement showing its value at the end of each six months. The $10 note was worth $10.30 at the end of the first half year and $11.94 at the end of three years. This was the most scientific form of legal-tender notes issued during the war, since it offered a continuing and increasing inducement to the owner to hold them as an investment instead of putting them in circulation.

Compound-Interest Notes.

In the summer of 1862 the silver subsidiary coins began to grow scarce. By the coinage act of 1853 their metallic value had been reduced 7 per cent, but they remained in circulation with the greenbacks until the latter had depreciated more than 7 per cent. Then, in obedience to Gresham's Law, they were exported and sold as bullion, or put into circulation in Canada. As small change thus became scarce, people began to use postage stamps as a substitute. The demand for stamps became greater than the Post Office Department could supply; and the stamps themselves, being flimsy and sticky, were inconvenient and exasperating to the last degree. Private individuals began to issue fractional

Fractional Currency.

currency and copper coins in great numbers and varieties to supply an indispensable need. On July 17, 1862, Congress authorized the issue of small notes to take the place of the stamps and of the local "shin-plasters," as they were popularly termed. The first form issued was a piece of paper with the facsimile of a 5-cent postage stamp in the center of it. The 25-cent note had the 5-cent stamp five times repeated. This was called "postage currency." By a later act fractional currency was issued in the form of promissory notes of the United States for sums less than one dollar. All of these, and also the postage currency notes, were redeemable by the government and receivable for all taxes except duties on imports. The notes were small in size, as well as of small denominations, and were easily worn out and lost. The largest amount in circulation at any time was about $27,000,000.[1]

The 10-40 Bonds.

On March 3, 1863, Congress passed a law providing for an issue of bonds bearing interest at 5 per cent, redeemable in ten years and payable in forty years, — known as the 10–40's. Two features of importance are to be noted in this measure. One was a provision making the principal, as well as the interest, of these bonds payable in coin. The other was the repeal of the clause of the legal-tender act which made the notes convertible into bonds at par.

When the legal-tender act was passed, creating two kinds of public debt, bonds and notes, nobody dreamed of paying the former with the latter. If any member of Congress had risen in his place while the bill was pending, and said that the government might sell $150,000,000 of interest-bearing bonds for gold, and then pay them off with the $150,000,000 of non-interest-bearing and irredeemable notes authorized

[1] See article on "The Private Issue of Token Coins," by R. P. Falkner, in the *Political Science Quarterly*, June, 1901.

by the same act, he would have been considered a lunatic. But a year had not elapsed before a considerable stir was created by persons who held that all the government bonds then outstanding might be lawfully paid with greenbacks. Accordingly, Congress made the principal of the 10–40's, as well as the interest, payable in coin.

Maturing Bonds paid in Gold.

On the first of January, 1863, an old debt of the government, contracted in 1842, for $8,000,000 became due, and Secretary Chase paid it in gold. The House of Representatives had previously asked him by resolution (December 16) in what kind of money he intended to pay it. He postponed the answer until he had actually paid it. He then said (January 5) that he had paid it in coin in order to keep the government's credit good.

It was disclosed later that the country had narrowly escaped a great danger. The Treasury had no gold at that time, or not sufficient to meet the claim, and some persons talked of paying it with legal-tender notes. At the last moment Mr. John J. Cisco, the assistant treasurer of the United States in New York, obtained $8,000,000 gold from the banks in exchange for legal-tender notes, on his personal pledge to redeem the notes with the first gold that came into his hands from customs duties. With the gold so obtained Mr. Chase paid the debt.[1]

Mr. Chase desired to have the funding clause of the legal-tender act repealed, because, as long as the holders of notes could convert them into 6 per cent bonds at par, no bonds could be sold bearing a lower rate of interest. He believed that, if this privilege were taken away, a loan could be negotiated at 5 per cent. Congress yielded to his request, fixing

[1] See letter of George S. Coe in Spaulding's *Financial History of the War*, second edition, appendix, p. 94.

a date (July 1, 1863) when the right of conversion should cease. This was an inexcusable breach of contract and a financial blunder. By preventing the voluntary conversion of the notes into bonds it prevented the early resumption of specie payments after the close of the war, as Chief Justice Chase acknowledged in his dissenting opinion in the *Legal Tender Cases*. Whenever the rate of interest on government securities in the money market should be less than 6 per cent, as it was immediately after the war, the notes would be converted into bonds and retired. This operation being automatic, being part of a contract, and coinciding with public opinion at the close of the war, which was favorable to specie resumption, would probably have worked out that result within a brief period.

Funding Clause repealed.

In June, 1864, Congress enacted that the whole amount of greenbacks issued or to be issued should never exceed $450,000,000, the last $50,000,000 being a temporary issue. When the war came to an end and the army was paid off and disbanded the amount remained fixed in the law at $400,000,000.

Secretary Chase resigned his office June 30, 1864, and was succeeded by W. P. Fessenden. Mr. Chase's last financial act was the preparation of a bill, which he induced Congress to pass, to "prohibit certain sales of gold and foreign exchange."[1] It prohibited sales of gold unless the person selling it had it in his actual possession and delivered it to the buyer the same day. It prohibited the purchase or sale of foreign exchange to be delivered more than ten days subsequently. It provided also that no purchases or sales of gold coin or bullion or of foreign exchange should be made except at the ordinary place of business of the seller or purchaser occupied

The Anti-Gold Law.

[1] Shucker's *Life of Salmon P. Chase*, p. 359.

by him individually. Violation of the law was punishable by fine or imprisonment or both, the smallest fine being $1000. The idea of Mr. Chase and of the congressmen who voted for the bill was that the brokers caused the price of gold to advance. They imagined that they could stop the advance by an act of Congress. Mr. Chase was of that opinion. Three days after the passage of the law he wrote to Horace Greeley: "The price of gold must and shall come down, or I 'll quit and let somebody else try."[1]

Its Repeal.

This measure became a law June 17, 1864. It remained on the statute book only two weeks. On the day it passed gold was quoted at 198. The next day it was 208, the next 230, and at the end of the month 250. At no time before had there been so rapid an advance. Congress repealed the act, without debate, on the 2d of July.

Early in 1864 Congress discovered that the issuing of greenbacks must be stopped and the policy of heroic taxation adopted. Laws were passed which yielded in 1866 a clear revenue of $558,032,620. This was equal to two-thirds of the entire expenditures in 1864. If taxation on this scale had been enacted in 1862 it would have yielded in 1864 as much as that of 1864 did in 1866, and the government's credit would have been strengthened in proportion to its income. Fewer legal-tender notes would have been required, the prices of commodities would not have advanced to any great extent, and the cost of the war to the taxpayers would have been much less than it was.[2]

[1] See letters of Chase to Greeley in the New York *Daily Tribune*, January 20, 1895.

[2] Professor Simon Newcomb, in his work on *Our Financial Policy during the Southern Rebellion*, published in 1865, but written before the war was ended, computed the government's net loss due to the use of a depreciated currency, down to the end of the year 1864, at

Were Legal-Tender Notes Necessary?

The question whether legal-tender notes were necessary at the time when they were issued, *i.e.*, whether the war could have been carried on without them, has been much disputed, and very respectable authorities are to be found on either side of it. Some are to be found on both sides, and among these

$180,000,000, and estimated the loss still to be incurred, even if the war should end immediately, at $300,000,000 more, or $480,000,000 in all. According to his reckoning the government saved $97,000,000 during the first year of the war by paying greenbacks instead of selling bonds, since it paid them to its creditors at something near par in gold, whereas the gold price of its 6 per cent bonds in the market ranged between 78 and 90. By paying $1000 in greenbacks the government got nearly $1000 worth of property, gold value; whereas, if it had sold a $1000 bond, it would have received only $780 to $900. "We were enabled to pay off contracts made when gold was at par, with notes after they had depreciated one-third." But the progressive decline in the purchasing power of greenbacks turned the scale. In the third quarter of 1863 the government made an average loss of 10 per cent in its purchases, and this loss rose to 68 per cent at the end of 1864. In 1865 the government was paying, with currency worth 75 cents per dollar, debts contracted when it was worth only 40 or 50 cents per dollar, and after 1879 it paid 100 cents on bonds sold at various rates of discount.

In his work on *Public Debts* Professor H. C. Adams computes the extra cost of the war to the taxpayers, in consequence of the use of a depreciated currency, at $850,000,000. This is the difference between the debt created and the gold value of the currency which the government received for its obligations.

Mr. Wesley Mitchell, in the *Journal of Political Economy*, March, 1897, computes the net increase in the cost of the war, due to this cause, at $528,400,000. In reaching this sum he assumes that the government's receipts were increased $228,700,000 by the use of greenbacks. In this calculation he assumes that the government's receipts from internal revenue were increased to the full extent of the depreciation of the currency, but he acknowledges that there is room for doubt whether this was the fact. Mr. Mitchell's paper is well worth examination, but it is too complicated for reproduction here, even by way of summary.

is Mr. Chase himself. What he said as Secretary of the Treasury we have seen. As Chief Justice of the Supreme Court at a later period he held not only that the legal-tender act was unconstitutional as applied to preëxisting debts, but that legal tender did not add anything to the value or usefulness of the notes. "The legal-tender quality," he said, "was valuable only for purposes of dishonesty. Every honest purpose was answered as well or better without it." [1]

A nation pays its annual expenses, in war as well as in peace, out of its annual earnings, except so far as it borrows from foreigners, and the only question for the Minister of Finance is how to lay his hands upon the portion he needs. Issuing legal-tender notes is one way; taxation is another. The principal advantage of the former method is that it can be put in operation immediately, whereas taxation involves delay. On the other hand, taxation strengthens the government's credit and enables it to borrow for its immediate needs until the taxing machinery can be put in working order. Moreover, the government may borrow by means of interest-bearing notes, which are not legal tender. Not to multiply words about the assumed necessity of legal-tender notes in the Civil War, it may be safely said that other methods ought to have been exhausted first. Mr. Don C. Barrett has shown (in the *Quarterly Journal of Economics*, May, 1902) that the needs of the government in 1862 were actually met by temporary deposits and certificates of indebtedness before the greenbacks could be engraved, printed, and issued.

Other Methods of War Financiering.

One of the reasons advanced by Senator Fessenden for opposing the legal-tender clause was that the loss would fall most heavily on the poor. All tricks of legerdemain

[1] See his dissenting opinion in the *Legal Tender Cases*, 12 Wallace, 457.

with the currency bear most heavily on the poor. Take a concrete case. The government wanted guns. It paid for them with legal-tender notes. The manufacturer must pay them to his workmen, who must buy their supplies of all kinds in a rising market. The cost of living not merely followed the gold premium, but generally kept above it. The dealers in commodities advanced their prices faster and farther than gold advanced, in order thus to insure themselves against loss by rapid fluctuations. Valuable lessons may be learned by considering the variations in the purchasing power of a soldier's monthly pay over commodities for each quarter of the four years of the war, as compared with the prices of January, 1860. The pay was nominally $13 per month. In the third quarter of 1862 it would buy $11.26 worth of gold and $11.11 of the commodities usually consumed in the family. One year later it would buy $9.96 gold and $8.07 commodities. One year later Congress raised the pay to $16 nominally, but even then (July, 1864) the gold value of the pay was only $6.19 and its purchasing power over commodities $6.40. In April, 1865, the gold value of the month's pay had risen to $10.77, but its value in commodities was only $7.69.[1]

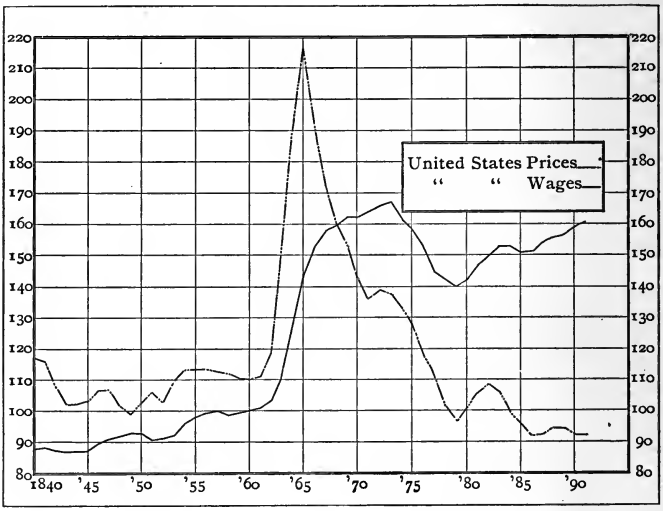
Effect of Legal Tender on Wages.

The question, in what manner wages responded to the advance in prices during the war, is an important one. Professor Taussig, of Harvard University, made a computation reaching substantially the foregoing conclusions, which he placed in graphical form. "It will be seen," he says, "that money wages responded with unmistakable slowness to the inflating influences of the Civil War. In 1865, when prices stood at 217 as compared with 100 in 1860, wages had only touched 143. The course of events at

[1] See article by Mr. Wesley Mitchell in the *Journal of Political Economy*, March, 1897.

this time shows the truth of the common statement that in times of inflation wages rise less quickly than prices, and that the period of transition is one of hardship to the wage-receiving class."[1]

PROFESSOR TAUSSIG'S CHART SHOWING THE COURSE OF WAGES AND PRICES OF COMMODITIES



We may here note the difference, in their effect on prices, between new supplies of gold and additions to the volume of an irredeemable currency. Nobody advances the price of his goods because new gold is coming out of the ground. Everybody knows that the gold he receives to-day is final payment, and that it will be accepted by others at the same general value to-morrow. Quite otherwise is the effect of an issue of irredeemable

Effect on Prices of Commodities.

[1] Paper read before the International Statistical Institute at Chicago, 1893.

paper. This is not final payment, but only a promise to pay at some indefinite time. The promise is also uncertain of fulfillment. Not all men realize these facts at first, but there are always some who do, especially bankers and dealers in foreign goods. To the latter class it is a matter of doubt whether they can replace their goods at the prices they formerly paid. Accordingly they will buy foreign exchange (which means gold abroad) in anticipation of their needs. This unusual demand will cause an advance in foreign exchange and also in the prices of the exportable commodities (including gold), by which foreign exchange is made. Eventually the advance will extend to all goods, domestic as well as foreign, because producers and dealers find that they cannot replace their stocks at the same prices as before. The advance is usually slow at the beginning. Thus, although specie payments were suspended on the 30th of December, 1861, the premium on gold did not reach 4 per cent until the month of May following.

First Trading in Gold.

When the premium on gold became noticeable in January, 1862, the business of buying and selling it began naturally in the shops of those Wall Street brokers who dealt in foreign coins. These brokers had gold and silver on exhibition in their windows. People who wanted coin went there to buy it. Those who wanted to sell coin for greenbacks naturally went there also. Gradually the dealings in front of their offices became so large that the traders blocked the sidewalks, and the public authorities were obliged to give special orders to the police to keep the crowds moving. The business being thus interrupted, the dealers took up their quarters in a neighboring restaurant, where the business went on until it outgrew its accommodations. Then the need of a Gold Exchange was recognized. Thirty or forty men who had been in the habit of meeting in the restaurant formed a

loose organization, hired a hall, and adopted rules by which any respectable man could become a member by paying $100 per year, to defray the expenses. This was in the autumn of 1862. It was a voluntary organization, existing under the rule of honor. Eventually it had 450 members, consisting of bankers, brokers, and merchants of the principal cities of the Union.

Gold Exchange organized.

At first the business was carried on by the manual delivery of gold in return for certified bank checks. To do this the gold had to be carried through the streets by messengers, who were sometimes knocked down and robbed. To facilitate the transactions the Treasury, in 1865, began to issue gold certificates of deposit, under authority of a law passed two years earlier. By and by the business became so large that it could not be carried on by manual delivery, even with the help of gold certificates. Then the Gold Exchange Bank was started as an adjunct to the Gold Exchange. This was an institution incorporated under the laws of New York, with a capital of $1,000,000. It did a regular banking business with its own capital, and it acted as a clearing house for the Gold Exchange at a fixed rate of compensation.

Gold Exchange Bank.

The method of clearing was as follows: Each transaction was noted on a "ticket of advice" signed by both buyer and seller. All the tickets were passed into the bank. If Mr. A. had bought $1,000,000 worth of gold from various persons at various prices and had sold $999,000, then instead of receiving from and paying to all these people he would settle only with the bank. He would receive at the close of the day $1000 in gold and would pay whatever sum in greenbacks was due from him as the resultant of all his transactions. The usual daily amount of such clearings was $60,000,000 to $70,000,000.

Gold Clearings.

All the foreign trade of the country, both imports and exports, was regulated by the daily and hourly quotations of the Gold Room. This trade could not have been carried on otherwise. The wholesale prices of all importable and exportable commodities were regulated by the quotations. Retail prices were affected at longer range. That is, the retail dealers were obliged to fix their prices high enough to cover fluctuations and to save themselves from loss. The consumer was not able to buy at the lowest price that the law of competition would, under other circumstances, have made. Commodities not of an exportable or importable kind were affected in less degree and at still longer range, but were not exempt from the influence. In short, the whole trade of the country, both external and internal, pivoted on the Gold Exchange. Gold being the universal liquidator of commerce, it was necessary to know where and at what price it could be obtained in any desired quantity. The Gold Exchange gave the answer to this question daily and hourly, and was accordingly indispensable.

A Commercial Necessity.

During seventeen years the business of the country was regulated by the quotations of the Gold Exchange and was exposed to the raids of gold gamblers. The most disastrous of these was the "Black Friday conspiracy," which was a trap set for exporters. The export trade of the country at that time necessitated the selling of gold in advance of its delivery. A buyer of wheat or cotton for export would make his purchase according to the current price of gold, but he would not get his returns from abroad for some weeks, nor could he get a negotiable bill of lading immediately. If the price of gold should fall meanwhile, he would be a loser. So he would sell at once the gold which he expected to receive later. He would do this by giving an order to a broker in the Gold Exchange to

Gambling Raids.

sell, putting up a small margin as a guaranty against possible fluctuations. Thus both the exporter and the broker would be protected, unless the fluctuations should be so great as to prevent the exporting merchant from keeping his margin good. In the latter event he might be ruined altogether.

"Selling Short."

The act of "selling short" is most commonly frowned upon as something akin to gambling. In this case the gambling consisted in not selling short. A fluctuating currency introduces the gambling element into all business, but more especially into the foreign trade of a country. By selling at once the gold that he expected to receive for his outward cargo, the exporter was doing a legitimate business. By waiting till his cargo arrived and his returns became available he took the risks of any amount of fluctuation in the interval.

Black Friday.

Mr. Jay Gould, who was at that time president of the Erie Railway, and a daring speculator, conceived the idea of buying all the gold in the market and compelling the "short" sellers to buy of him, when their contracts should mature. He organized a clique of brokers, speculators, and Tammany Hall politicians, who succeeded by various devices and by enormous purchases in carrying the price up from 133 to 162 in about twenty days, the greater part of the rise being in two days, September 23–24. The 24th was always afterwards known as Black Friday. About 250 persons and firms were caught "short" of gold, who had no way of meeting their contracts except by buying it of Gould and his party. The consequences were thus described by a Committee of Congress, of which General Garfield was chairman:

> Hundreds of firms engaged in legitimate business were wholly ruined or seriously crippled. Importers of foreign goods were for many days at the mercy of gamblers and suffered heavy losses. For many weeks the business of the whole country was paralyzed,

a vast volume of currency was drawn from the great channels of industry and held in the grasp of the conspirators. The foundations of business morality were rudely shaken, and the numerous defalcations that shortly followed are clearly traceable to the mad spirit engendered by speculation.

Black Friday and its evil consequences were due to the existence of a bad currency and a fluctuating standard of value. The Gold Room was at that time a necessity. Business could not be carried on without it, but it offered temptations and facilities for gambling which could not be resisted; and this gambling was more calamitous than any other, because the prices of all commodities and securities were affected by it. It was only an exaggerated and glaring illustration of the evils of an unstable currency.

When the war came to an end in May, 1865, the price of gold sank to 130, at which rate greenbacks were worth 77 cents per dollar. It had been as high as 285 in July, 1864, greenbacks being then worth 36 cents. The difference between these extreme quotations may be taken to represent changes in the public credit, or various vicissitudes and states of mind, dependent upon the war, wholly apart from the redundancy of the circulation, since the currency was no greater in volume at the one date than at the other.

The baleful effect of these fluctuations was shown very clearly in California. As that state was an integral part of the Union, the legal-tender act was as valid there as elsewhere, yet the greenbacks never became current there until after specie payments were resumed. California had no banks of issue and was entirely unfamiliar with paper money. It was not without a severe struggle, however, that the gold standard was maintained. The claims of loyalty were imported into the controversy, and it was stoutly

California adheres to the Gold Standard.

insisted by the greenback party that unwillingness to use legal-tender notes was akin to treason. Their opponents replied that they were entirely willing to use the notes at their actual value, but not at a higher value. They contended that, except for past debts, greenbacks could not be used at anything above their actual value, because the prices of commodities would fluctuate in some near proportion to the fluctuations of the currency. If taken for more than their actual value by ignorant persons, such persons would be cheated. In regard to past debts they said that it would be unjust to pay less value than the parties had agreed for.[1]

There is an advantage in studying the events in California at this time, because what happened there, in plain sight and hearing, took place on an immensely larger scale elsewhere, but was, for the most part, unnoticed.

There were no railways to the Pacific coast at that time, hence several months elapsed before any commercial effects were produced by the legal-tender act. On the 17th of September, 1862, a firm in San Francisco published a letter in the *Alta California* saying that they had been compelled to receive many thousands of dollars in legal-tender notes for goods which they had bought for gold and had sold on credit at gold prices. They had tendered the notes to their employees in payment of wages, but the latter had refused to receive them, saying that the boarding houses, the butchers, and the grocers would not take them at par. "For ourselves," said the firm, "we wish to maintain the government, but we would like the burden to fall equally on all classes."

Early Embarrassments.

On March 5, 1863, a victim of the legal-tender law wrote to the *Evening Bulletin* of San Francisco that he had

[1] See article "Legal Tender Notes in California," in the *Quarterly Journal of Economics*, October, 1892, by Professor Bernard Moses.

lent $10,000 in gold coin four years previously to a man in Sacramento, taking his note for it. The promissory note was lodged at the banking house of D. O. Mills & Co. for collection. The borrower came to the bank and tendered $10,000 in greenbacks as full payment. Greenbacks were then worth 68 cents on the dollar. D. O. Mills & Co. refused to receive the tendered greenbacks without the consent of the owner of the note, and denounced the conduct of the debtor as unfair in the extreme. After a protracted dispute the creditor accepted the $10,000 in greenbacks and $1000 in gold, rather than enter upon a doubtful lawsuit. His loss then was $2200, but as he kept the notes a few months, it became $3500.

Severe Losses.

Business was thrown into confusion by the contrariety of practice in different parts of the state with reference to greenbacks. Attempts were made to introduce into promissory notes, invoices, and bills of sale a clause stipulating for payment in gold, and these attempts were partially successful, but this could not be done with accounts current, with telegraphic orders, or with retail trade conducted on the credit system. On the 8th of November, 1862, the merchants of San Francisco entered into a written agreement not to receive or pay legal-tender notes except at their market value in gold. Country merchants were invited to sign it also. If anybody should refuse to sign or should violate the agreement, the others would decline to have any business transactions with him. This plan was slow in getting into operation and could not be made comprehensive enough to meet the emergency, since it included regular dealers only, and not transient customers.

Confusion in Business.

Presently a case came into court, where a citizen had tendered greenbacks for state taxes and the collector had

refused to receive them. The Supreme Court of the state decided that taxes were not "debts," and hence that the legal-tender law did not apply to them. This view was eventually sustained by the Supreme Court of the United States. The decision of the state court had a great influence on local public opinion, by strengthening the hands of the anti-greenback men.

Greenbacks not Legal Tender for Taxes.

In October, 1862, the Board of Supervisors of San Francisco adopted a resolution to pay the interest on city and county bonds in gold coin and instructed their financial agent in New York to advertise to that effect. This action likewise tended to strengthen the position of the anti-greenbackers.

On February 12, 1863, resolutions were introduced in the Legislature, asking the general government to except California from the operations of the legal-tender law. One of the reasons advanced by the mover of the resolutions was that the rate of interest had risen to double the customary rate because lenders were fearful that no form of contract could prevent the payment of greenbacks where gold had been promised. Lenders required a higher rate to compensate them for this risk. The resolutions were, however, rejected.

Rise of the Rate of Interest.

An agitation now was started by the *Daily Herald* for a law to enforce the payment of contracts in whatever kind of money the parties might agree for. The Legislature took up the subject in earnest, and in April, 1863, passed a law to this end, not mentioning gold, greenbacks, or any particular kind of money by name. This was known as the Specific Contract Law. It provided merely that in an action on a contract, or obligation in writing, payable in a specified kind of money or currency, the judgment should be payable in such money

Specific Contract Law.

or currency. The parties might stipulate for English sovereigns, or Spanish doubloons, or notes of the Bank of France, as well as for American eagles, or greenbacks; the law would enforce the contracts in all cases. The act was passed upon by the Supreme Court of the state the same year and pronounced constitutional. It was also held to be applicable to contracts made before its passage. Both these doctrines were subsequently affirmed by the Supreme Court of the United States, in terms which implied that the Specific Contract Law was superfluous. In other words, specie contracts were enforceable without it.

Sustained by the Supreme Court of the United States.

It remains to notice other decisions of the Supreme Court of the United States on the subject of legal-tender notes.

Supreme Court Decisions.

In the case of *Lane County* vs. *Oregon*[1] (December, 1868) the court held unanimously that the legal-tender acts of 1862 and 1863 did not apply to taxes imposed by the authority of a state, and that taxes are not "debts." It followed that if a state made its taxes payable in gold the taxpayer's obligation could not be discharged with legal-tender notes.

In *Bronson* vs. *Rodes*[2] (December, 1868) the court held that a contract specifically payable in gold and silver coin could not be discharged by a tender of United States notes.

In *Butler* vs. *Horwitz*, immediately following, it was held that a contract to pay a certain sum in gold and silver coin is, in legal effect, a contract to deliver a certain weight of gold and silver of a certain fineness. In this case the contract had been made in 1791 and was for payment in "English golden guineas." It was held in this case that damages for breach of contract should be assessed in coin also.

Gold Contracts Enforceable.

[1] 7 Wallace, 71.
[2] 7 Wallace, 229.

In *Hepburn* vs. *Griswold*[1] (December, 1869) it was held by five judges against three (the opinion of the court being delivered by Chief Justice Chase) that the making of notes, or bills of credit, a legal tender in payment of preëxisting debts is not a means appropriate, plainly adapted, or really calculated to carry into effect any express power vested in Congress; is inconsistent with the spirit of the constitution and is prohibited by the constitution. Also that the clause in the acts of 1862 and 1863 which makes United States notes a legal tender in payment of all debts, public and private, so far as it applies to debts contracted *before* the passage of those acts, is unwarranted by the constitution.

The Hepburn Case.

The judges who concurred with the Chief Justice were Clifford, Nelson, Grier, and Field. The dissenting judges were Miller, Swayne, and Davis.

In the *Legal Tender Cases*[2] (December, 1870) the foregoing decision was reversed by five judges against four. The opinion of the court was delivered by Justice Strong, who had been appointed in place of Justice Grier, resigned. A new member (Bradley) had been added, in pursuance of a law passed by Congress in April, 1869, raising the whole number of judges to nine. The opinion read by Justice Strong implied that the power of Congress to make the government's notes legal tender between individuals on preëxisting contracts was an incident and consequence of the war power, but it did not expressly say so. The legal points of the opinion will not be considered here, but some attention must be given to an economical dictum found in it, *viz.:*

The Hepburn Judgment reversed.

It is hardly correct to speak of a standard of value. The Constitution does not speak of it. It contemplates a standard for

[1] 8 Wallace, 603. [2] 12 Wallace, 457.

that which has gravity or extension, but value is an ideal thing. The coinage acts fix its unit as a dollar, but the gold or silver thing we call a dollar is in no sense a standard of a dollar. It is a representative of it. There might never have been a piece of money of the denomination of a dollar. There never was a pound-sterling coined until 1815, if we except a few coins struck in the reign of Henry VIII, almost immediately debased, yet it has been the unit of British currency for many generations. It is thus a mistake to regard the legal-tender acts as either fixing a standard of value, or regulating money values, or making that money which has no intrinsic value.

Judge Strong on "Value."

The learned judge here confounds value with the standard of value, and speaks of both as having no concrete existence. Value is an ideal thing in the same sense that weight is. The former means exchangeability; the latter means force of gravity. A dollar is a definite amount of exchangeability as an ounce is a definite amount of the force of gravity. The former will bring to its possessor a given quantity of goods; the latter requires a given amount of force to lift it. Both are fitted to become standards, — the one of value and the other of weight, — and when made such by law they are not ideal but concrete things. The legal-tender act, as has been remarked previously, was a change of the definition of a term in common use, *i.e.*, the word "dollar." It had previously meant a definite amount of metal of a specified fineness. Under the new definition it meant the government's promise to pay this thing at an indefinite time.

The five judges who concurred in this opinion were Strong and Bradley in addition to the minority in the Hepburn case. Separate dissenting opinions were read by Chief Justice Chase and by Judges Clifford, Field, and Nelson.

In *Juillard* vs. *Greenman*[1] (March, 1884) it was held that

[1] 110 U. S., 421.

Congress has the constitutional power to make the Treasury notes of the United States a legal tender in payment of private debts in time of peace as well as in time of war. Also that legal-tender notes redeemed and reissued under the act of May 31, 1878, are a legal tender, although not expressly made so by that act. The opinion of the court was delivered by Justice Gray, and a dissenting one was written by Justice Field. In Justice Gray's opinion we find the following statement:

The Latest Decision.

> The power, as incident to the power of borrowing money and issuing bills or notes of the government for money borrowed, of impressing upon those bills or notes the quality of being a legal tender for the payment of private debts, was a power universally understood to belong to sovereignty in Europe and America at the time of the framing and adoption of the Constitution of the United States.

George Bancroft, the historian, reviewed this opinion in both its legal and its historical aspects. Referring to the statement quoted above, he declares it to be "a stupendous error," and affirms that no such power was understood to belong to sovereignty in Europe at that time, *i.e.*, in 1788.[1]

George Bancroft's Criticism.

RECAPITULATION

United States notes, otherwise called greenbacks, or legal tenders, were issued by Congress during the Civil War, to the maximum sum of $450,000,000. They were similar in their nature and consequences to the Colonial and

[1] "The Constitution of the United States of America Wounded in the House of its Guardians," by George Bancroft. Pamphlet, 1884.

Revolutionary bills of credit that preceded them, but the depreciation was not so great. The lowest rate reached by them was 35 cents per dollar in the year 1864.

The notes were originally made convertible, at the option of the holder, into bonds bearing coin interest at 6 per cent. This connecting link between the notes and gold was unwisely repealed in 1863. If it had remained in force, the notes would have been exchanged for bonds whenever the price of the latter was above par, and specie payments would probably have been resumed automatically soon after the close of the war.

As the notes were declared by law to be legal tender for all debts public and private, except duties on imports and interest on United States bonds, many people affirmed and believed that the principal of the bonds could be rightfully paid with greenbacks, although the latter were irredeemable. This misconception led to a political controversy of great bitterness, long duration, and doubtful issue.

The cost of the war was largely enhanced by the use of irredeemable paper, the prices of arms, ammunition, and supplies having risen in consequence of currency inflation. The prices of commodities were relatively higher during the suspension of specie payments than the premium on gold. Dealers sought to protect themselves in this way against loss by fluctuations in the value of the currency.

The wages of labor did not advance *pari passu* with the prices of commodities during the war. The effective pay of the soldiers was seriously reduced by the advance of prices. Thus the pecuniary burden of the war fell most heavily upon the classes least able to bear it.

Irredeemable currency makes changes in the distribution of property among individuals and classes. It works injustice between debtors and creditors and between employers

and employees. It promotes speculation, introduces the gambling element into business, defrauds the wage-earner, and brings ruin upon innocent people.

The issuing of irredeemable paper is sometimes called a forced loan, but it has none of the characteristics of a loan. A loan, even when forced, implies an accounting and repayment to the lender. No such thing is promised or contemplated when such paper is issued, but merely that somebody shall be paid something at some time. Even this promise is not always fulfilled.

The value of greenbacks during the suspension of specie payments was recorded during the business hours of each day by actual sales and purchases of gold on the New York Gold Exchange. In 1864 Congress attempted to check the depreciation of the currency by closing the Gold Exchange and prohibiting sales of gold or foreign exchange for future delivery. The premium on gold advanced more rapidly after the passage of this act than before, and Congress repealed it two weeks later.

Gambling in gold was one of the evils of the time, and almost a necessary one in connection with the foreign trade of the country. In 1869 a scheme was set on foot by an unscrupulous speculator for the purpose of "cornering" gold, *i.e.*, buying all the gold in the market and compelling persons who had sold it for future delivery to buy it from him and his clique. It resulted in a most disastrous panic, ruining or seriously crippling hundreds of business men in the principal cities of the Union. The day on which the catastrophe occurred was afterwards known in Wall Street as Black Friday.

United States notes never became current in California until after the resumption of specie payments. The business community declined to receive them, except at their value in gold. The Legislature of the state passed an act

known as the Specific Contract Law, by virtue of which contracts should be enforceable in any kind of money the parties should stipulate for. This law was upheld by the highest courts of the state and of the United States.

The Supreme Court of the United States has held that a contract between private persons, if made specifically payable in coin, cannot be discharged with legal-tender notes. Also (December, 1869), that the legal-tender act of 1862 was unconstitutional so far as it applied to debts contracted before its passage. The last-mentioned decision was reversed one year later (December, 1870). It was inferred from the language of the court in this decision that the power of Congress to make the notes of the United States legal tender between individuals on preëxisting contracts was an incident of the war power. In March, 1884, the court held that Congress has power to make the notes of the United States legal tender in time of peace as well as in time of war.

Authorities

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Spaulding's *History of the Legal-Tender Money issued during the Great Rebellion.*

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CHAPTER IV

CONFEDERATE CURRENCY[1]

THE provisional government of the Confederate States of America was formed at Montgomery, Ala., on the 8th of February, 1861. Its Secretary of the Treasury was C. G. Memminger. Its first financial act (March, 1861) was the issue of $2,000,000 of Treasury notes in denominations not smaller than $50. They bore interest at the rate of 3.65 per cent and were payable to order, — that is, to some person named in the note and transferable by his endorsement. They were not intended to be used as currency and were not so used. Shortly afterwards the Confederacy borrowed $15,000,000 on bonds drawing 8 per cent interest, for which it received gold value during the year 1861. The money was expended in the purchase of arms, ammunition, and supplies abroad. An export duty of $\frac{1}{8}$ cent per pound on cotton was enacted, but by reason of the blockade of the Southern ports it yielded scarcely anything. Later in the same year, May 16, the Confederate Congress authorized the issue of $20,000,000 of non-interest-bearing Treasury notes of denominations of $5.00 and $10, redeemable in specie in two years and convertible into 8 per cent bonds. These were intended to circulate as money, and they became at once the currency of the Confederacy.

First Steps.

[1] The principal authority for the facts embraced in this chapter is Professor J. C. Schwab's *The Confederate States of America, 1861–1865* (Charles Scribner's Sons, 1901).

The issue of bonds was increased to $150,000,000, and it was sought to make this, in part, a produce loan. Cotton, corn, flour, pork, beef, and tobacco were to be taken in exchange for bonds, and agents were appointed to solicit subscriptions among the planters. Nine-tenths of all the subscriptions were in cotton. The reason why cotton was offered so profusely was that the Confederate Treasury was the only market open to the planter, whose customary market was cut off by the blockade. Meanwhile he had his own obligations to meet, and these could not be satisfied with 8 per cent bonds any more than with cotton itself.

A Produce Loan.

There was an outcry in many quarters for relief for the planters. Some persons advocated an issue of Treasury notes, with which to buy all the cotton offered for sale. Others proposed a loan of such notes on the cotton as security. Either of these plans, it was seen, would cripple the Confederate finances at the start, by filling the field of circulation before the armies were fairly in motion. The Confederate Congress did nothing for the planters, but some of the separate legislatures voted them Treasury notes of their own state issues on the security of cotton, which was left in the hands of the planters themselves.

At the end of 1861 there were $105,000,000 of Confederate Treasury notes outstanding, and the premium on gold was 15 to 20 per cent, — the record is not exact. The notes were never made legal tender. The question of making them such was frequently under debate in Congress, but was always decided in the negative. Although the Confederate Congress did not, and Southern state legislatures could not, make the notes legal tender, the latter bodies, or some of them, deprived creditors of the remedies they had previously enjoyed for collecting their dues in the courts of law.

The Currency not Legal Tender.

On August 19, 1861, the Confederate Congress authorized an issue of $100,000,000 of Treasury notes of denominations of $5.00 and upwards. It was the opinion of the Southern bankers, who were then holding a convention at Richmond, that this might be safely done, but the limit was raised to $150,000,000 before the end of the year. The notes were redeemable "six months after the ratification of a treaty of peace between the Confederate States and the United States." They were convertible into bonds drawing 8 per cent interest, or into call certificates drawing 6 per cent, the latter being reconvertible into notes at the holder's option.

Internal taxation was not resorted to by the Confederacy in the first year of the war, except by a direct tax on the states, which was paid mostly by issues of state notes or bonds, — that is, by borrowing. The customs yielded next to nothing, the ports being blockaded. It was Secretary Memminger's opinion at the outset that the war should be carried on by loans, with just sufficient taxation to pay interest. The Confederate Congress did not go so far in the way of taxation as Secretary Memminger advised. It preferred to rely on bond issues and note issues altogether. It accordingly passed an act in April, 1862, for $165,000,000 of 8 per cent bonds and $50,000,000 of new notes. It also issued another kind of note, of the denomination of $100, bearing interest at the rate of 7.30 per cent, receivable for taxes. It was supposed that these would be held for investment, but they were soon found to be in circulation. Prices of commodities were rising so rapidly that the notes were worth more in trade than in one's strong-box. Only 9 per cent of the public expenses was met with bonds, 85 per cent with notes, and 6 per cent with taxes, donations, and the confiscation of Federal property.

Failure to tax.

As early as September, 1862, every barrier to note issues was thrown down by the passage of an act authorizing issues limited only by the public expenses. This system avoided present trouble, but it added to the anxieties of the Secretary of the Treasury, who knew that it was ruinous in the long run. Produce loans were resorted to as a partial check to excessive issues of currency. The government thus obtained the ownership of 430,000 bales of cotton, and was able to ship 19,000 bales to Europe by blockade-runners. In December, 1862, the Treasury notes outstanding, including state issues, reached $500,000,000, and gold was worth 3 for 1.

As the foregoing methods were proving fruitless, the idea was conceived of making cotton the basis of a loan abroad. After various negotiations the scheme was undertaken by the house of Erlanger & Co. of Paris. It was for £3,000,000 sterling, and was secured by cotton in the Confederate States at a valuation of 6*d.* per pound. Cotton was then selling at 21*d.* per pound in England. The payments were to be made in monthly instalments, the first one being 5 per cent. The subscription was opened March 21, 1863, at the issue price of 90, and was said to have been over-subscribed five times in England alone. Yet after deducting brokers' commissions, interest on bonds, repurchases to sustain the market, and other expenses, the net amount realized on the $15,000,000 of bonds was only $6,500,000. The Confederate cruisers were paid for out of the net amount received.

At the beginning of 1863 Mr. Memminger addressed himself to the task of getting his Treasury notes funded into bonds. He recommended that a bill be passed providing that notes not funded before August 1, 1863, should cease to be currency and cease to be convertible. The Confederate Congress passed a bill with elaborate provisions to

carry this plan into effect. It contained also provisions for issuing new notes to the amount of $50,000,000 per month. This attempt to brand the old notes while issuing new ones threw the currency into worse disorders than before. The Richmond banks refused to receive the old notes as deposits, and the Virginia Legislature ordered that they should not be received for state taxes. Newspapers denounced the act of Congress as repudiation. The note-holders, seeing that the old notes were likely to become worthless, now hastened to fund them, and actually sent in $125,000,000 in three months of 1863, but in these three months $150,000,000 of new notes had been issued. The total amount outstanding on the 1st of January, 1864, was upwards of $700,000,000, and the gold quotation was 20 for 1. Only $5,000,000 was raised during the year by taxation. The total debt of the Confederacy was now $1,221,000,000.

Compulsory Funding.

Various schemes of repudiation were now on foot. They took shape eventually in a bill (passed February 17, 1864), providing that all outstanding notes smaller than $5.00 should be convertible into bonds and receivable at par till the 1st of July, 1864, and thereafter be taxed out of existence within the year. Simultaneously another issue of notes was authorized (a sort of "new tenor," like the secondary issues of colonial bills of credit), for which the old notes, except those of $100 and upwards, could be exchanged at the rate of $3.00 old for $2.00 new; $426,000,000 were so exchanged. The currency had now become unmanageable. The $100 notes continued to circulate after they had been outlawed. There was active funding for some months after the passage of this bill, and its effect was shown in a decline of the gold quotation from $23 to $17 for $1.00; but when the new notes came out, it rose again to $23 in September, and reached

Partial Repudiation.

$40 before the end of the year. The volume of currency was now fully $1,000,000,000. The old notes and the new ones circulated side by side, were equally discredited, and continued to depreciate together. They passed in trade at the same rates. The credit of the Confederate Government was now shattered, and Mr. Memminger resigned his office in midsummer, 1864.

He was succeeded by George A. Trenholm of Charleston. The latter was not slow to perceive that compulsory funding had been a grave mistake. "Apprehensions of ultimate repudiation," he wrote to Governor Bonham, "crept like an all-pervading poison into the minds of the people, and greatly circumscribed and diminished the purchasing power of the notes." In January, 1865, the gold quotation was $53 for $1.00. Secretary Trenholm proposed to reverse the policy of compulsory funding, in order to save the government's credit, but it was too late. A bill to carry Mr. Trenholm's plan into effect was passed by the House, but failed in the Senate. There was nothing to do now but to make fresh issues of notes, although the previous law for this purpose contained a pledge that there should be no more. In March, 1865, a bill for $80,000,000 of "new tenor" was passed over the President's veto. There was some talk about heavier taxes on exports and imports, although there were none to be taxed. The last scheme was for a specie loan of $3,000,000, failing which there was to be a tax of 25 per cent on all the specie in the Confederacy. This singling out of one kind of property, and putting on it a tax of one-fourth of its value, was confiscation. The Richmond banks, which were most exposed to the application of force, advanced $300,000, and almost immediately thereafter the Confederacy collapsed.

Final Collapse.

Almost every blunder that it was possible to commit in national finance was committed by the Confederacy, and on

a gigantic scale. The initial one was the failure to tax. The direct tax on the states, as we have seen, was largely met by borrowing, and this was additional to the Confederate borrowing and in the same field. In 1863 the Confederate Congress was awakened to the necessity of taxing the people by its own machinery, but it was now too late to do so effectively. The population was sparse, the means of communication slow, and the territory to be covered wide, with much of it in possession of the Union forces. Worst of all, the swelling volume of the currency inflated the prices of property so that a given rate of taxation payable in dollars yielded a constantly lessening value. In order to overcome this difficulty a system of tithing was enacted, — that is, a tax payable in produce, of the kinds needed by the army. This system was grossly unjust to the farmers. The man who had to pay $100 in currency, and the one who had to contribute one hundred bushels of corn, did not stand on the same footing. The former might pay in 1863 not more than $10 in value measured by gold, and not more than $5.00 in 1864, while the one hundred bushels of corn contributed by the latter remained a fixed, unshrinkable quantity. The farmers made so stout a resistance to the tithing system that it yielded very small returns.

Fatal Mistakes.

The next blunder in Confederate finance was that of paying interest on loans in irredeemable paper. It must not be assumed that there was no other alternative. No other was ever tried. It would have been time enough to fall into the pit when it could not be avoided. The government should have bought specie at the market price and paid the interest on the bonds with it, in order to support the public credit.

The third and fatal folly of the Confederacy was the compulsory funding act. No casuistry could disguise this

step. It was repudiation, and it brought its own speedy punishment. If military events had not brought the Confederacy to an end in April, 1865, it must have collapsed financially about that time. In other words, the power to supply the army in the field with food, clothing, arms, and ammunition could not have continued much longer. The blockade of the Confederacy, of course, intensified its financial difficulties. Secretary Memminger attributed his failure to it. Indeed, if it had had free communication with Europe the Confederacy might have survived the errors of its Treasury Department and the war might have had a different ending.

The note issues of the separate states are of importance in connection with those of the Confederacy as throwing light on the course of a paper currency unregulated by redemption in specie and unrestrained by anything except the whims of legislatures. The "wants of trade" in respect of money are never so imperious as when governments are issuing irredeemable notes. Prices of commodities advanced faster than the price of gold. This was because dealers made an extra charge for goods, by way of insurance against fluctuations in price. The advance of prices absorbed the new currency and created an abnormal demand for more. The appetite was shared by the state governments, by cities and counties, by banks, by railroad and other corporations; and finally the right of issue was assumed by private persons, such as tobacconists, grocers, barbers, and milk dealers, who issued tickets, which they gave out as change in the ordinary course of trade and promised to redeem in goods or services. Alabama began with an issue of $1,000,000 of state notes as early as February, 1861, and the amount was increased later to $3,500,000. These were receivable for state taxes. Georgia issued $18,000,000 of state notes

State and Private Currency.

redeemable in Confederate notes. These were in effect an addition of that sum to the Confederate currency. Mississippi made liberal issues to relieve the distressed cotton-planters. All the states east of the Mississippi River issued notes. The city of Richmond issued scrip in denominations from 25 cents to $2.00. Charleston, Pensacola, Augusta, and other cities followed suit. Georgia granted "banking privileges," which meant the right to issue notes, to two railroad companies. Factories, turnpike companies, insurance companies, and others assumed this right either with or without legislative authority. Money was as nearly equal to the wants of trade as the printing press could make it. The state legislatures at last attempted to prevent the circulation of personal and corporate notes, but the evil had grown beyond their reach. Virginia passed three acts for this purpose, but they could not be enforced. People considered these private notes as good as the public ones (as they were), and so continued to accept them. The banks issued their own notes freely, since they were not obliged to redeem them, suspension having been legalized in all the states.

RECAPITULATION

For the means of meeting the expenses of the Civil War the Confederate States of America relied almost wholly on Treasury notes, which served as the currency of the people. Those notes were not made legal tender by legislative authority, but were made practically so by public opinion and by the repeal of state laws for the collection of debts. Their course was similar to that of the Revolutionary bills of credit. They became nearly worthless before the close of the war, and were repudiated in part by the Confederate government and were superseded by

another batch, a sort of "new tenor," which pursued the same downward career.

Secretary Memminger said that it was impossible to carry on war by means of taxes alone. This was a mistake. Except money borrowed abroad, every country pays the cost of a war at the time of the war. The Southern Confederacy presents an easy illustration of this maxim, because it was for the most part isolated, having little communication with the outer world, and because all of its debts were obliterated at the end of the war. Obviously somebody paid the cost. It was not paid by foreigners (except the trifling sum borrowed in Europe), nor did it fall from the moon. There being nobody else to pay it, the people of the Confederacy must have paid it, and must have paid it during the time of the war, and not a moment later. To levy taxes sufficient to pay the whole of each year's expenses within the year would not have made the burden any greater than it actually was. The Confederacy, by assuming that taxes to pay interest on money borrowed would be sufficient, did not get rid of heavier ones. It only levied them in a different way.

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CHAPTER V

AFTER THE WAR

Money as an Educator.

THE money circulating among the people is a powerful educator. It teaches either truth or falsehood. Sometimes the results of its false teachings are merely whimsical; more often they are disastrous.

We have seen in a previous chapter that after the formation of the Latin Monetary Union a million and a half of silver francs, of the coinage of the Papal States, rushed into France with those of Italy proper, although the Papal government was not a member of the Union. These coins bore the effigy of Pope Pius IX. They gradually found their way into the pockets of the least intelligent members of the community. In 1875 there was a loss of two sous on each of these Roman francs, and in some parts of France the Roman Catholic priests lost their influence with the peasants in consequence.[1] The latter put the blame of their loss on the Pope and on the priests as agents of the Pope. One of the consequences of this delusion was that all candidates for the Chamber of Deputies who were supported by the priests were defeated by the votes of the peasants. It was useless to say to these people that they ought not to have accepted the Roman coins, that the Papal States were not members of the Monetary Union, and that neither the Pope nor the priests were to blame. The people could not

[1] *Round my House; Life in France in Peace and War*, by Philip Gilbert Hamerton, p. 214.

understand such things. The only facts they could grasp were the Pope's effigy on the coins and the loss of the two sous.

Our legal-tender act taught people false notions. First, it led large numbers of unreflecting persons to believe that the government can make money. If the government can do so, people argued that it ought to make money plentiful. The legal-tender act led to the belief also that the government's bonds were payable in greenbacks. The act said that the notes should be lawful money and a legal tender for all debts, public and private, within the United States except duties on imports and interest on government bonds.

Paying Bonds with Greenbacks.

These words printed on the greenbacks led multitudes of people to think that the government could rightfully pay the first piece of paper with a second one. If it could do so, it could pay the second with the first. Thus, by swapping one for the other, the whole debt might be paid without taxation. As all other governments could do what we could, all national debts might be settled in a twinkling. But there would be no need of taking the trouble to exchange an interest-bearing bond for a non-interest-bearing note. The whole debt could be canceled by simply passing a law saying, "All bonds of the United States are legal tender and shall cease to bear interest after the passage of this act."

The policy of paying the 5–20 bonds in greenbacks was advocated by General Butler in the Republican party, and by George H. Pendleton in the Democratic, immediately after the close of the war. Both of them were defeated in their respective national conventions in 1868, but in different ways. The Republican Convention discountenanced in its platform the payment of the bonds in greenbacks. The Democratic Convention favored it, but rejected Mr. Pendleton as a candidate for the presidency, and nominated

Horatio Seymour, who was strongly opposed to that policy. The Republicans carried the election, and soon thereafter (March 18, 1869) Congress passed an act declaring that all government obligations were payable in coin unless the law under which they were issued expressly provided for some other payment.

This did not put an end to the controversy, however. The fight was long and bitter. If the question of paying the bonds with greenbacks had been referred to popular vote at any time between the end of the war and the resumption of specie payments, the result would have been very doubtful.

In his annual report, December, 1865, the Secretary of the Treasury, Mr. Hugh McCulloch, recommended the policy of contracting the currency with a view to the early resumption of specie payments. The House of Representatives, on the 18th day of that month, by a vote of 144 to 6, adopted a resolution "cordially concurring" in the recommendation. An act to carry that policy into effect was passed April 12, 1866. It authorized the Secretary to sell bonds for the purpose of "retiring Treasury notes or other obligations issued under any act of Congress, . . . *provided* that, of the United States notes, not more than $10,000,000 may be retired and canceled within six months from the passage of this act, and thereafter not more than $4,000,000 in any one month."

Policy of Contraction adopted.

In February, 1868, Congress suspended the reduction of the currency under the foregoing act. The act thus repealed had been in force twenty-one months, and 44,000,000 of the greenbacks had been retired, but the Secretary had not exercised his full powers under it. The amount outstanding when the cancellation was suspended was $356,000,000.

Repealed.

In 1870 and 1871 the Secretary of the Treasury, Mr. George S. Boutwell, issued $6,000,000 of legal-tender notes in lieu of those retired by his predecessor, Mr. McCulloch, showing that, according to his view, those notes were still legally in existence, although they had been actually withdrawn and canceled. The Senate Committee on Finance made a report upon this action, holding that the Secretary had no power to issue notes for any portion of those retired under the act of 1866. Although Congress took no action on the report, Secretary Boutwell retired a large part of the reissued notes, and his successor, Mr. Richardson, retired the remainder. Soon afterward, Secretary Richardson himself reissued $26,000,000 of the retired notes in a vain attempt to check the financial panic of 1873, thus bringing the whole amount up to $382,000,000.

Greenbacks reissued.

In February, 1874, the Senate Committee on Finance reported a bill, the first section of which fixed the maximum amount of United States notes at $382,000,000, and the second section provided that, on the 1st of January, 1876, the Secretary of the Treasury should either exchange gold coin at par for United States notes, or give 5 per cent bonds for them on the demand of any holder of the notes. The bill was amended in the Senate by inserting $400,000,000 instead of $382,000,000 and by striking out the second section altogether. This was known as the Inflation Bill, as it sanctioned the policy of adding to the volume of an irredeemable currency in time of peace. It passed both houses, but was vetoed by President Grant, who thereby rendered the country a great service. Yet he intended at one time to sign the bill and had written a paper to accompany his approval of it. Congress then hurriedly

Inflation Bill of 1874.

Vetoed by President Grant.

passed another bill fixing the maximum amount of legal-tender notes at $382,000,000, which was signed by the President June 22.

The Inflation Bill having been a Republican measure and vetoed by a Republican President, the party was left in a position of great embarrassment, and was badly beaten in the congressional elections of that year. It could neither inflate nor stand still. The only other course was to take steps for resuming specie payments. It improved the few remaining weeks of its power to pass a bill for this purpose. The bill was reported from the Committee on Finance by Senator Sherman, December 21, 1874, and passed the following day without any change. It first removed certain restrictions upon the circulation of national banks and provided that the Secretary of the Treasury should "redeem" greenbacks to the amount of 80 per cent of the new bank notes issued, until the total volume, which was then $382,000,000, should be reduced to $300,000,000. It provided that the Secretary should, "on and after January 1, 1879, redeem in coin the United States legal-tender notes then outstanding, on their presentation for redemption at the office of the assistant treasurer of the United States in the city of New York, in sums of not less than fifty dollars." The selling of bonds to provide means for redemption was authorized without limit as to amount.

Specie Resumption Act of 1875.

The word "redeem" was used in the act in two places without any definition of its meaning. Ordinarily the redemption of a promissory note means paying and canceling it, and this was the necessary meaning of the word in the place where it was first employed. It meant that the volume of greenbacks should be reduced to $300,000,000 by retiring and canceling the excess over that sum, for if the excess were

Doubts as to its Meaning.

not canceled the reduction could not take place. The true meaning of the word having been determined in one part of the act, its use in another part would have been clear and binding upon all courts of law; but Senator Sherman, when asked whether the greenbacks which should be redeemed would be put out of existence, refused to answer the question. The bill passed both houses without any explanation on this point, and became a law January 14, 1875.

All doubts were resolved by Congress itself three years later. October 31, 1877, the House Committee on Banking and Currency reported a bill to repeal the specie resumption act, and this was passed by the House November 23, by a vote of 133 to 120. At this time the Democrats had a majority of twenty in the House. The Senate was composed of thirty-eight Republicans, thirty-seven Democrats, and one Independent (Davis, of Illinois), who usually voted with the Democrats on financial measures. The Senate rejected this measure by a majority of one vote only. April 29 the House passed a bill, 177 to 35, without debate, forbidding the retiring or canceling of any more legal-tender notes and providing that any thereafter redeemed should be reissued, paid out, and kept in circulation. This bill was concurred in by the Senate, 41 to 18. Before its passage Senator Bayard offered an amendment that notes once redeemed should not thereafter be legal tender between individuals, but this was rejected, 18 to 42. This measure became a law May 31, 1878. At that time the volume of greenbacks outstanding was $346,681,016, at which it still remains.

Attempts to repeal it.

The passage of the specie resumption act was followed by a battle at the polls the following year. The center of this engagement was in the state of Ohio, where the Democrats had declared in their platform that the amount of money ought to be made "equal to the wants of trade."

This sophism was slain by Carl Schurz in a speech at Cincinnati, which decided the campaign. The phrase "equal to the wants of trade" means the wants of anybody in trade. It also requires measures to put the person in possession of what he wants. Since all must be treated alike, it follows that everybody must be served with greenbacks at the public treasury till he says he has enough. To give everybody all the greenbacks he wants would give nobody an advantage, except by canceling past debts. Therefore an act of Congress canceling all debts would accomplish the same end more expeditiously.

Campaign of 1875.

The immediate result of the voting in Ohio in 1875 was the election of Rutherford B. Hayes as governor. A secondary result was his elevation to the presidency the following year. He appointed John Sherman Secretary of the Treasury. During 1877 and the following year Mr. Sherman was engaged in refunding the national debt in pursuance of the act of July 14, 1870. In connection with this negotiation he arranged with a banking syndicate for the sale of new bonds under the resumption act, by which he was to receive gold coin at the rate of $5,000,000 per month. Before the 31st of December, 1878, he had accumulated $95,500,000 in this way, and the Treasury held about $20,000,000 additional derived from customs duties. The law had prescribed no plan of resumption. Everything had been left to the Secretary's discretion and to the chapter of accidents. This laxity of Congress was due in part to a general disbelief that resumption would or could be accomplished under that act. When the time approached and the decline of the gold premium betokened a strong probability that the law would be carried into effect, the agitation in both political and financial circles was extreme. On the 17th of December

Resumption accomplished.

the premium on gold disappeared quietly and the Gold Exchange was closed because there was nothing for its members to do. On the 1st of January, 1879, the Treasury offered to redeem its legal-tender notes, but none were presented for that purpose. The banks of the large cities had previously kept two kinds of accounts with such of their customers as desired them, one in paper and one in gold. They now discontinued this practice and kept accounts only in "dollars." Therefore nobody had any motive to draw gold from the Treasury to deposit in banks.

Gold Imports in 1879 and 1880.

The chapter of accidents did more than anybody had anticipated. The year 1879 proved to be the most remarkable in our history in a commercial sense. The crops of wheat, corn, and cotton were unexampled in magnitude and excellence, while those of the Old World were extremely deficient. The balance of trade turned in our favor suddenly and strongly. This condition of things was repeated on a somewhat smaller scale in the harvests of 1880. The two years witnessed importations of gold to the amount of $175,000,000, putting the immediate success of specie resumption beyond peradventure.

The $100,000,000 Reserve.

No reserve for maintaining specie payments had been fixed in the law nor was the need of any reserve recognized until 1882, when the subject was brought to the attention of the Senate in an incidental way. A bill to amend the National Bank Act was under consideration. A section relating to gold certificates of deposit was embraced in it.[1] On the 21st of June, in that year, Senator Aldrich moved an amendment

[1] The issue of gold certificates had been authorized by Section 5 of the act of March 3, 1863, in these terms: "That the Secretary of the Treasury is hereby authorized to receive deposits of gold coin and bullion with the Treasurer or any assistant treasurer of the United States, in

to it by providing that the Secretary of the Treasury might, in his discretion, suspend the issue of such certificates whenever the amount of gold in the Treasury available for the redemption of United States notes should fall below $100,000,000.

The object of the amendment was to prevent the holders of greenbacks from drawing gold from the Treasury, redepositing it there, and taking gold certificates for it, all at one operation, thus perhaps possessing themselves of all the gold in the Treasury and at the same time using the government's vaults as a free safe depository. Senator Allison remarked, while this amendment was under consideration, that "thus far there has been no absolute definition of what the reserve fund should amount to." In order to supply such a definition, Senator Ingalls moved to amend the amendment, making it read as follows:

Provided, that the Secretary of the Treasury shall suspend the issue of such gold certificates whenever the amount of gold coin and gold bullion in the Treasury *reserved* for the redemption of United States notes falls below one hundred millions of dollars.

In this form it became a law, July 12, 1882, and thus a reserve of $100,000,000 gold in the Treasury for the redemption of United States notes was recognized as existing, although not established by affirmative legislation. It created in men's minds the habit of considering the greenbacks as redeemable in gold at the option of the holder, although they were legally redeemable in gold or silver at the option of the government.

sums not less than $20 and to issue certificates therefor in denominations not less than $20 each, corresponding with the denominations of United States notes. The coin and bullion deposited for, or representing, the certificates of deposit shall be retained in the Treasury for the payment of the same on demand."

On July 14, 1890, Congress passed an act for the issue of an indefinite amount of legal-tender notes for the purchase of silver bullion. This is commonly called the Sherman Act. It was a part of the silver legislation treated in the following chapter.[1] The notes were to be redeemed on demand in "coin," either gold or silver, at the discretion of the Secretary of the Treasury, but it was declared in the words of the act to be "the established policy of the United States to maintain the two metals on a parity with each other upon the present legal ratio or such ratio as may be established by law." This was a hint rather than a command to the Secretary in favor of gold redemption. The notes were declared in the act to be "legal tender in payment of all debts, public and private, except where otherwise expressly stipulated in the contract." In practical effect this was a fresh issue of greenbacks in time of peace, and of unlimited amount. The only restriction in the law was as to the rate of issue, which was to be the sum necessary to pay for 4,500,000 ounces of silver bullion each month at the market price. Nearly $156,000,000 of these notes were issued. A financial panic of great severity ensued, and the act was repealed November 1, 1893.

The Sherman Act.

The act of 1890 was not grounded upon financial considerations. It was part of a political trade. In the Senate, April 29, 1896, Senator Teller of Colorado gave what he called the "unvarnished history" of the Sherman Act, which has never been contradicted. He said that the Republicans desired to pass the McKinley tariff bill. The silver men desired to pass a free-coinage bill. The latter had a majority in the Senate,

Silver and Tariff Bills in 1890.

[1] The Sherman Act of 1890 is introduced here for the purpose of presenting all the legislation respecting legal-tender notes in consecutive order.

with power to adopt a free-coinage clause as an amendment to the tariff bill and thus compel the House to adopt it or lose the latter bill altogether. They did not follow that plan because they knew that President Harrison would veto a free-coinage bill, even if, in doing this, he should kill the tariff bill. So the silver senators determined to adopt, not a free-coinage measure, which would certainly be vetoed, but the nearest possible approach to it, and put this measure on its passage ahead of the tariff bill. This was done, as the following legislative record shows:

May 17, 1890. The McKinley tariff bill passed the House.

June 5. Mr. McKinley moved in the House to take up the Windom silver bill, which was amended by adopting the Conger substitute, and passed June 7, by 135 to 119.

June 17. The Senate took up the House silver bill, amended it by adopting the Plumb substitute (a free-coinage measure), and passed it by 42 to 25.

June 25. The House took up the silver bill, non-concurred in the Senate amendment and asked a conference.

July 7. The Conference committee reported the Sherman bill, which was adopted by the House on that day and by the Senate July 10.

July 14. The Sherman silver bill was approved by the President.

July 25. The McKinley tariff bill was taken up by the Senate and passed September 11.

Thus the Sherman silver bill was passed by the Republicans as the price of the McKinley tariff. Mr. McKinley himself was an ardent advocate of the former measure. "Vote against this bill," he said (June 7, 1890), "and in my judgment you vote that there shall be no legislation on the silver question at this session of Congress. That is what I fear it means. We know we cannot have free coinage now except in the manner as provided in this bill."

The McKinley tariff bill repealed the duties on sugar and molasses, which had yielded $55,000,000 of revenue in the fiscal year 1890, and the Sherman silver bill added about $50,000,000 per year to the public expenses for the purchase of silver bullion. These two measures exactly canceled the surplus revenue ($105,000,000) of the year 1890, and a new pension bill added $50,000,000 more to the expenditures in 1893, when it came into full operation. Thus the ingredients of a witch's cauldron, in the shape of a Treasury deficit and a financial panic, were collected for President Cleveland's second administration.

The Treasury Deficit.

That the country had a sufficiency of instruments of exchange in the summer of 1890, before the Sherman Act was passed, is proved by the fact that we exported about as many gold dollars as we obtained of new paper ones while the act was in operation. The output of new legal-tender notes to July 1, 1893, was $140,661,694, and the net export of gold during the same time was $141,017,158. This coincidence was not accidental. Whenever there is an excess of instruments of exchange forced into circulation by their legal-tender faculty, one of two things will happen. If they are redeemable in gold, there will be an outflow of that metal. If not redeemable, there will be a depreciation of the whole mass. The great exportation of gold in the years following the passage of the Sherman Act is thus easily accounted for, but it was stimulated by the alarm of investors lest specie payments should be suspended.

Gold Exports.

On March 14, 1900, Congress passed "an act to define and fix the standard of value, to maintain the parity of all forms of money issued or coined by the United States, to refund the public debt, and for other purposes." This is commonly but mistakenly called "The Gold Standard Act," whereas the gold standard was established by the act of February 12, 1873.

The act of 1900 reaffirmed the earlier act, but it also contained important specific provisions for maintaining the gold standard. It provided in direct terms that all the legal-tender notes should be redeemed in gold coin on demand and that a reserve of $150,000,000 of gold coin and bullion should be kept in the Treasury for this purpose solely; that notes redeemed out of this fund should not be reissued except in exchange for gold; that if the fund should at any time fall below $100,000,000, it should be restored to the maximum sum of $150,000,000 by the sale of bonds, and that none of the proceeds of such sales of bonds should be used to meet deficiencies of the current revenues.

The Currency Act of 1900.

It was also provided that there should be a complete separation of the currency functions of the Treasury from its fiscal operations. Bureaus, or divisions, of issue and redemption were established in the Department, to which were transferred all the funds held for the redemption of greenbacks, Treasury notes, gold certificates, silver certificates, and currency certificates. These were to be held as trust funds exclusively, and were not to be mixed with the ordinary receipts and disbursements of the government. The need of this provision had been demonstrated by the events of President Cleveland's second term (1893–97), when the deficiencies of revenue amounted in the aggregate to $155,000,000, forcing the Secretary of the Treasury to draw upon the gold reserve to meet the current expenses of the government. This phenomenon was designated in common parlance the "endless chain." The phrase was a misnomer. It implied that there was something in the nature of the greenback peculiarly adapted to the purpose of pumping gold out of the Treasury indefinitely. In practice, the holders of the notes

Divisions of Issue and Redemption.

The "Endless Chain."

presented them at the Treasury for redemption. After redeeming them the Secretary paid them out again, for lack of other money. Then they were presented for redemption a second time, and so on. But if the Secretary had had a surplus of daily receipts over daily expenses, the same greenbacks could not have been presented for redemption twice without his consent. Hence the "endless chain" could not have existed. Under the act of 1900, which separates the currency function from the other operations of the Treasury, no such trouble can arise. Shortage of revenue cannot vitiate the money in the pockets of the people and need not disturb their equanimity. Thus the act of 1900 does much to maintain the gold standard which had been established by law twenty-seven years earlier.

The Treasury notes of 1890 are now in course of retirement. In the war-revenue act of June 13, 1898, the Secretary of the Treasury was directed to coin the silver bullion bought under the act of 1890 into silver dollars at the rate of not less than $1,500,000 per month. The act of 1900 provided that, as they were coined, an equal amount of the Treasury notes which had been issued to pay for the bullion should be canceled as fast as they should come into the possession of the government, and that silver certificates should be issued in place of them. The effect of this measure will be to lessen the direct liabilities of the gold reserve by the sum of $156,000,000 and to add that amount to the silver currency, plus $62,000,000 derived from seigniorage, which is the number of silver dollars that the bullion will yield over and above the cost of the metal. Authority was granted in the act of 1900 to use a part of this bullion (about $20,000,000) for subsidiary coinage, in order to bring the total volume of the latter up to $100,000,000, a corresponding amount of Treasury notes to be canceled.

Treasury Notes to be retired.

The Secretary of the Treasury was directed to resume the issue of gold certificates, in denominations not less than $20, in exchange for gold coin deposited in the Treasury. The issue of gold certificates had been suspended in 1893, in compliance with the law which said that it should be suspended whenever the amount of gold in the Treasury fell below $100,000,000. It was also provided that thereafter silver certificates should be issued only in denominations of $10 and under, and that greenbacks should be issued only in denominations of $10 and upward. The Secretary was authorized, in his discretion, to issue a small amount of silver certificates in denominations of $20, $50, and $100, not more than 10 per cent of the whole amount outstanding. The object aimed at in lowering the denominations of silver certificates and raising those of greenbacks was to give the field of retail trade as much as possible to the silver certificates.

Minor Provisions of the Act of 1890.

The issue of currency certificates was discontinued by the act of 1900. These had been authorized by the act of June 8, 1872. Under it any national bank might deposit United States notes in the Treasury, in sums of not less than $10,000, and receive certificates of deposit, in denominations of not less than $5000 each, the notes to be held as special deposits and to be used only for the redemption of the certificates. These were issued for the convenience of banks in settling clearing-house balances. The reason for discontinuing their issue was that, as there was now a plentiful supply of gold certificates for clearing-house purposes, currency certificates were no longer needed.

At the present time the denominations of paper currency, of all kinds, authorized to be issued and reissued are the following:

Greenbacks, $10 and upward to $1000; but some notes of the denomination of $5.00, previously issued, are still outstanding.

Gold certificates, $10 and upward to $10,000.

Silver certificates, $1.00 and upward to $100, but not more than 10 per cent of the total volume shall be of higher denominations than $10.

Denominations of Paper Currency.

National bank notes, $5.00 and upward to $100, but not more than one-third of the total issues of any bank shall be of the denomination of $5.00. Some notes lower than $5.00 and some higher than $100, issued under former laws, are still outstanding.

Treasury notes of 1890, formerly issued in denominations of $1.00 and upward to $20, are now in course of retirement. None can be reissued.

RECAPITULATION

As government paper is a promise to pay money, its value depends upon the fulfillment, or expected fulfillment, of the promise, which, in turn, depends upon the ability and good faith of the issuing government.

Several of the American states in the colonial period, whether able to redeem their paper or not, were unwilling to do so. The government of the Revolution and that of the Southern Confederacy, whether willing to redeem their paper or not, were unable to do so. The government of the United States after the Civil War, although able to redeem its paper, postponed redemption fourteen years. During that interval its policy in reference to redemption underwent frequent changes and was involved in doubt.

Congress voted in December, 1865, in favor of the early resumption of specie payments. In pursuance of this design, in April, 1866, it passed a law for retiring and

canceling the legal-tender notes at the rate of $4,000,000 per month. In February, 1868, it repealed the last-mentioned act, $44,000,000 of the notes having been retired meanwhile. In 1873 the Treasury Department reissued $26,000,000 of the retired notes, without authority of law. In 1874 Congress passed a bill to reissue the entire $44,000,000, but President Grant vetoed it, and it was not passed over the veto.

In 1875 Congress passed an act to provide for the resumption of specie payments on the 1st of January, 1879. In 1877 the House passed a bill to repeal the specie resumption act, but this was defeated in the Senate by one vote. Both houses passed a bill providing that the legal-tender notes should not be retired when redeemed, but should be paid out and kept in circulation. The amount of notes then outstanding was about $346,000,000.

Specie resumption took place January 1, 1879.

In 1890 Congress passed a law for a new emission of legal-tender notes of indefinite amount, to pay for silver bullion to be stored in the Treasury. The new issues of notes were followed by the exportation of gold to nearly the same amount and by a disastrous financial panic.

This shifting policy indicates that there will always be uncertainty in respect of the redemption of government paper and of the amount issued. Such uncertainty attaches to the United States notes now outstanding, since it depends upon the political majority to decide what amount shall be issued and whether redemption shall continue or not. For this reason the notes should be redeemed with the surplus revenue of the government and canceled as soon as possible.

CHAPTER VI

SILVER DOLLARS AND THE PANIC OF 1893

WHILE Secretary Sherman was selling bonds for gold, to prepare for the resumption of specie payments, Congress was passing a bill for the remonetization of silver. In 1876 this metal had declined 9 per cent from our old ratio of 16 to 1. The currency expansionists, who had been sorely disappointed by President Grant's veto of the Inflation Bill and by the loss of the Ohio election, turned eagerly to silver, as a means of accomplishing the ends which they had failed to reach with greenbacks. Silver, they said, was a product of labor. Its quantity could not be increased suddenly. It was the dollar of our fathers. It was the dollar of the poor man, of the debtor, of the common people. Looking at the law, they discovered that the silver dollar had been abolished by an act of Congress, passed in 1873, and that those of them who were members of Congress at that time had voted for it. So they said that they had been tricked and deceived, that this act of 1873 was a conspiracy against the debtor class, and that it was passed in a clandestine manner. They declared that this was a great wrong. Many people who had no particular interest to be served by inflation really thought that a wrong had been done. Some of them even thought that the wrong had been done to silver itself, by depriving it of the "legal right of coinage."

First Silver Agitation.

The charge that the act of 1873 was passed secretly was absurd on its face, since there is no way under our system of government to pass a law secretly. The act was called the "crime of 1873"; and the accusation was reiterated frequently and supported by forged documents and false swearing in the political campaigns of twenty successive years. Due diligence had been shown by the framers and promoters of the law to publish and explain its provisions, but very few persons, either in or out of Congress, took any interest in the question; and of those who did so nearly all were in favor of its passage. Nor would any charge of fraud and secrecy have been brought against the supporters of the measure, if silver had not subsequently fallen in value. The bill was introduced in both houses in 1870, at which time 16 ounces of silver were worth 40 cents more than 1 ounce of gold. Nor was there any time during the three years while the measure was pending in Congress when silver was worth less than gold according to the legal ratio. Hence there was no motive for deception. The persistence of the charge of fraud during so long a period of time, in the face of so many opposing facts, is one of the most singular episodes in our political annals.

The "Crime of 1873."

The movement for the remonetization of silver acquired considerable strength in 1876. The opponents of the Inflation Bill were taken by surprise when the controversy assumed this new form. Moreover, the question of bimetallism was something new and strange. Many persons who had considered greenback inflation ruinous were glad to have escaped the evil of unlimited paper but could see no harm in silver dollars.

Movement for Remonetization.

The opponents of silver were of three classes: (1) those who were opposed to it in any form except as subsidiary coin; (2) those who were opposed to free coinage except

by international agreement; (3) those who did not believe that an international agreement was practicable but who wanted to gain time, hoping that the excitement would pass away. The advocates of silver were likewise of different types: (1) The silver miners, who wanted to sustain the price of their product; (2) the currency inflationists, who had been defeated and were glad to find a new weapon to their hand in place of the greenback[1]; (3) a multitude of misinformed persons, who thought that an injustice, if not a fraud, had been committed in the demonetization act of 1873.

New Alignment of Parties.

On July 26, 1876, just before the adjournment of Congress, Mr. Kelley of Pennsylvania introduced a bill to restore the coinage of the silver dollar, as it had existed prior to the act of 1873, and moved to pass it under suspension of the rules, which required a two-thirds majority. The bill failed: yeas 119, nays 68. A similar bill was introduced by Mr. Bland of Missouri the following year, and was passed by the House November 5, 1877, by 164 to 34.

The Bland Bill.

In order to defeat free coinage and gain time, some of its opponents in the Senate said that it would not be right to

[1] An inflationist is one who desires that the government shall do something to make money more plentiful and prices higher, and whose political action is directed to that end. Professor Charles J. Bullock, in his *Essays on the Monetary History of the United States*, shows by statistics that the support of the silver movement in the several states was generally in inverse proportion to the density of population and the abundance of capital. Thus eleven states whose density was above 60 per square mile supported the gold standard in the election of 1896. Of eighteen states whose density was between 21 and 46, only eight supported the gold standard. Of sixteen states whose density was less than 18, only four supported the gold standard. "It is evident, therefore," says Mr. Bullock, "that the inflationist movement at the present day, as in all previous times, finds its strength in the sparsely settled regions, where the scarcity of capital is most keenly experienced" (p. 119).

give to those who happened to be the owners of silver bullion, or who were digging it out of the ground, an advantage of 9 per cent over everybody else; that this profit ought to accrue to the government; that, since the government had no silver bullion, it ought to purchase a certain quantity at the market price, coin it, and sell the resulting coins to the people, or use them to pay its expenses or to buy more bullion. This was a plausible argument to defeat the Bland bill and was probably the only one by which a free-coinage bill could have been prevented from passing at that time.

The Allison Amendment.

An amendment proposed by Senator Allison — providing for the purchase of not less than $2,000,000 worth, and not more than $4,000,000 worth, of silver bullion each month, to be coined into dollars of full legal tender and to be paid out like any other money in the Treasury — was adopted by the Senate and accepted by the House. The bill was vetoed by President Hayes, on the ground mainly that it embodied a violation of contracts which had been entered into since 1873, by introducing a less valuable payment than was contemplated by the parties. The bill was, however, passed over the veto and became a law February 28, 1878. The votes taken in the House fairly represented the state of public opinion at the time. There were 73 votes to sustain the President's veto — *i.e.*, against silver in any form — and 196 in favor of the limited coinage of the Allison amendment. As between the latter and the original Bland bill the vote was 203 to 72. The party of moderation and compromise exceeded the extremists on both sides. One section of the Allison amendment, which authorized the President to invite an international monetary conference, led to the Paris conference of 1878. Another section authorized any holder of silver dollars to receive certificates of deposit from the Treasury

Vetoed and passed.

in exchange for them, in denominations not less than $10, such certificates to be receivable for all government dues.

On November 12, 1878, the New York clearing house, after a personal conference with Secretary Sherman and in anticipation of the resumption of specie payments, voted to admit the sub-treasury to the clearing house, for the purpose of settling balances between the government and the banks; to receive and pay balances in gold or in legal-tender notes; to prohibit payment of balances in silver dollars or silver certificates, except in sums under $10; and to receive silver dollars from customers as deposits only under special contract to withdraw the same in kind.

In 1882 Congress passed an act amendatory of the national banking law. In it was inserted a provision that "no national banking association shall be a member of any clearing house in which such [silver] certificates shall not be receivable for clearing-house balances." The New York clearing house thereupon rescinded its rule discriminating against silver certificates but did not discontinue the practice. The members voluntarily declined to pay them to each other.

The Bland-Allison Act did not make money more plentiful than it would otherwise have been, but merely substituted silver in place of gold. Two operations were going on, side by side. The mint, regarded as a manufactory, was paying out gold already in its possession, in order to purchase silver bullion, and was selling the coins so produced, crediting itself with the seigniorage, *i.e.*, the difference between the raw material and the finished product. On the other hand, the people needed a certain number of instruments of exchange, called dollars, for the transaction of their daily business. These instruments they paid for with their labor and their property, at the rate of 100 cents gold per dollar. Obviously they could have whichever metal they preferred, since gold value will always

Modus operandi.

bring gold. Thus the bill did not make money more plentiful, although it seemed to do so, but merely substituted one kind of money for another.

The mode of operation was as follows: The government bought (say) $2,500,000 worth of silver bullion, paying gold for it. When the silver dollars were produced, it might pay them out like any other money or it might make its next purchase of silver bullion with the dollars, or the certificates, resulting from the last purchase. If there was a public demand for this kind of money, the dollars would stay out. If not, they would come back to the Treasury through the custom house and the tax office, taking the place of gold in the payment of government dues.

The officers of the Treasury were slow in learning how to ward off the evils of this queer kind of currency, of which they had had no previous experience. Each secretary restricted the coinage of silver dollars to the lowest amount permitted by the law, *viz.*, $2,500,000 per month, or $30,000,000 per year. As the coins were bulky and inconvenient, the people refused to take any large quantity. At the end of June, 1879, only $8,000,000 had gone into circulation, out of $36,000,000 coined. The remainder were in the Treasury,[1] an inert mass. Inasmuch as the government had a surplus of revenue more than sufficient to pay for the monthly purchase of silver bullion, no present harm resulted.

Slow Circulation of the New Dollars.

The prosperity resulting from the crop conditions of 1879 and 1880 called for an increase of the circulating medium and not merely led to the large importations of gold referred to in the preceding chapter, but drew out of the Treasury nearly all of the accumulated silver. This was taken in the form of certificates, in exchange for gold. The movement

[1] See Taussig's *Silver Situation in the United States* (second edition), which may be studied with profit for all periods down to the end of 1896.

was accelerated by an offer, on the part of the Treasury, to pay silver certificates in the West and South, in exchange for gold deposited in the sub-treasury at New York. Whenever the rate of exchange was in favor of the West and South, the person desiring to make remittances could save express charges by accepting the government's offer. In this way the surplus silver in the Treasury was worked off for the time being. "For the three years 1881, 1882, and 1883, the silver currency was absorbed by the public as fast as the dollars were coined at the mint."[1]

Rapid Movement in 1879 and 1880.

A trade reaction began in 1884. The silver already in circulation remained there, but the annual addition continued. As fast as it was paid out by the Treasury, it returned in the receipts for taxes. Simultaneously the public revenue began to decline, and the gold reserve showed a shrinkage of $34,000,000 in 1884–85. Gold receipts for customs duties fell from 75 per cent of the whole to 36 per cent, and silver receipts rose from 17 per cent to 36 per cent, the other receipts being greenbacks. In Boston, where the banks made no discrimination against silver, the certificates constituted so large a part of the circulation that, when it became necessary to send money by express to New York, a sufficiency of gold or greenbacks could not be obtained, and a premium of one-half of 1 per cent on funds bankable in New York prevailed in Boston for a short time. The New York banks even turned in $6,000,000 of their gold to the Treasury, in exchange for fractional currency, in order to avert the use of silver certificates by the Treasury in the settlement of clearing-house balances there.

Crisis in 1884.

In 1885 the Secretary of the Treasury, Mr. Manning, perceived that the true method of utilizing the silver

[1] Taussig, 24.

currency was to force it into retail trade. To make room for it, he gave orders to stop the issue of greenbacks of less denomination than $5.00 and to retain all such that came into the Treasury in the way of collections, in order to create a necessity for the use of silver. In 1886 he procured from Congress authority to issue silver certificates of the denominations of $1.00, $2.00, and $5.00. As national bank notes smaller than $5.00 had been forbidden some years earlier, the field of small paper circulation was thus secured for silver certificates. Thereupon the demand for them became very large, rising in 1890 to $175,000,000 in denominations of $5.00 and under, and to $293,000,000 in all. The number of coined dollars in circulation at that time was $56,000,000 in addition.

Small Silver Certificates introduced.

The introduction of small silver certificates happened to coincide with a shrinkage of the volume of national bank notes due to the redemption of the 3 per cent bonds and to a rapid advance in the price of other bonds, which made it profitable for the banks to retire their circulation, sell their bonds, and realize the premium.[1] One hundred and sixty-eight million dollars of the bank notes were retired between November, 1882, and February, 1890, — that is, in seven years and three months. The output of silver dollars during the same period was only $50,000,000 in excess of the bank notes retired.

[1] "In 1883 upwards of $353,000,000 government bonds were on deposit as a basis of bank-note circulation. Out of this total more than $200,000,000 were in the 3 per cents, and it was naturally these very 3 per cents which the Treasury selected in its public debt redemption [because they were subject to call at par]. Whenever such bonds were called for redemption, the bank possessing them was compelled either to replace them with other government issues bought in the open market, or else to retire its circulating notes." — NOYES' *Thirty Years of American Finance*, p. 108.

When the silver coinage act was passed in 1878, its opponents predicted that sooner or later it would cause a financial panic. They said that, since the metallic value of the silver dollars was not equal to the face value, they were simply a new kind of fiat money, and that, whenever they should become redundant, they would act like any other fiat money, — like the greenbacks at the beginning of the war, for example. There would then be a change in the standard of value, if the coinage were continued. This was a true prophecy, but the fulfillment was delayed by the shrinkage in the national bank circulation and by the retirement of small greenbacks, which created a vacuum for the new silver to fill. But this was a silent operation. The public could not understand it, and so, as the years rolled on and no harm came from the coining of silver dollars, the predictions of panic fell under popular ridicule.

Panic predicted.

The passage of the Sherman Act of 1890 and the reasons for it have been considered in the preceding chapter.[1] There were now three kinds of fiat money which the government, according to its declared policy, must keep at par with gold, namely, greenbacks, Treasury notes, and silver dollars. All three rested, and still rest, upon the gold resources of the Treasury. Those resources consist of its accumulated reserve and of its daily receipts. It is immaterial, as regards the government's gold balance, whether redemption is made at the place where the reserve is paid out (the sub-treasury) or where the receipts come in (the custom house). The effect upon the balance is identically the same in the two cases.

The Act of 1890.

Nearly $50,000,000 of new fiat money came into the channels of business the first year after the passage of the

[1] Page 159.

Sherman Act; and, as it happened, an equal amount of the surplus in the Treasury was paid out by enlarged appropriation bills passed by Congress. These additions to the circulating medium presaged renewed exports of gold, which took place in the first half of 1891 to the amount of $74,000,000, — a sum hitherto unexampled for a single period of six months.

Gold Movements of 1891 and 1892.

The harvests of 1891, however, happened to give temporary relief from the consequences of bad financiering. "The United States produced in that year the largest grain crop in its history before or since. While Europe's total wheat yield decreased 156,000,000 bushels from that of 1889, our own crops increased 255,000,000 bushels, the largest American crop on record."[1] The foreign exchanges turned in our favor, and we imported $50,000,000 gold in the six months succeeding the harvest. This was merely a streak of luck. As soon as the foreign demand for our grain was satisfied, the new fiat money began once more to produce its usual effects. Gold exports were resumed in 1892. In November of that year the gold in the Treasury had fallen from $185,000,000 (in August, 1890) to $124,000,000 and was still declining. Secretary Foster was much depressed. When he came to New York to speak at a dinner of the Chamber of Commerce, he said, among other things, that the government intended to maintain gold payments, even if it became necessary to sell government bonds for the purpose. This was an admission on his part that gold payments could not be continued without resorting to extraordinary means. Probably Mr. Foster made this speech in order to test public sentiment and to find out whether he would be sustained in issuing government bonds in time of peace. There had been no increase of the bonded debt since the close of the

Action of Secretary Foster.

[1] Noyes, 164.

Civil War, and some persons in high place denied that there was any legal authority to issue new bonds. Apparently Mr. Foster was satisfied by the applause with which his announced purpose was received by his hearers and by the press, for shortly afterward he issued an order to the Bureau of Engraving and Printing to prepare new bonds. This order was dated February 20, 1893, and Mr. Foster was to go out of office on the 4th of March. Naturally, he preferred to put upon his successor the onus of issuing the bonds, if he could. So he came to New York and persuaded the banks to give him a few millions of gold in exchange for legal-tender notes, enough to carry him along till the 4th of March. This enabled him to glide out of office leaving the $100,000,000 redemption fund intact, but with only $982,410 gold in excess of that sum and with the penumbra of a deficit in full view.

The shrinkage of the government's reserve and the continued outpour of fiat money had shaken the confidence of the business communities on both sides of the water. The banks no longer furnished gold to their customers who desired it for export, but gave them legal-tender notes instead. Hitherto no doubt had crossed the minds of the community that the government would redeem its notes on demand, but now it was seriously questioned whether the Treasury could maintain gold payments. The bankers did not know whether the new Secretary of the Treasury, Mr. Carlisle, would take steps to replenish his reserve, and they could not know whether any steps he might take would be effectual. So they kept their gold and paid their debts with legal-tender notes.

When Secretary Carlisle came into office, he saw bankruptcy approaching. The gold receipts of the Treasury were now less than 9 per cent of the total receipts. He first followed his predecessor's example by soliciting gold

from the banks in New York City. The banks responded by turning $8,000,000 into the Treasury, in exchange for legal tenders. This was quickly dissipated, and on April 15 the Secretary was obliged to acknowledge that the $100,000,000 fund had been encroached upon. It was the first time that this had happened since the fund was created. On the 20th the Secretary gave a newspaper interview, which was construed by the public to mean that he had doubts whether the $100,000,000 fund could be lawfully used for the redemption of the Treasury notes of 1890. This was a fresh cause of alarm, which was, however, soothed by a later announcement from President Cleveland that the redemption of those notes in gold would be continued under all circumstances.

Panic of 1893.

On the 26th of June the news came that the mints of India had been closed to silver, and the price of that metal fell in three days from 82 cents to 67 cents per ounce. A run on the banks began at once. One hundred and fifty-eight national banks and four hundred and fifteen state and private banks were compelled to close their doors.

The question has been much discussed whether the financial disturbance of 1893 was a typical commercial crisis or a money panic. A commercial crisis is a shattering of the credit system due to speculation and maladjustment of industry. If the conditions of production and consumption were at all times well balanced, so that no more wheat, cloth, iron, houses, factories, ships, railroads, etc., were produced than could be sold or used at a profit, then each producer would be able to pay his debts promptly and there could be no commercial crisis. But in the complex conditions of modern society no such equable distribution of capital and labor is possible. There is no omniscient eye to tell us when we are

Commercial Crises.

producing too much of one thing or putting too much capital and labor into certain lines of business. The commercial world is, accordingly, subject to periodical crazes, in which there is a general rush to buy things and invest money in ways which promise unusual gains. Prices are inflated and particular branches of trade are overloaded and cease to be remunerative. Then the adventurers cannot meet their obligations, and their creditors are crippled or made bankrupt. Lenders of money become alarmed and the credit system breaks down. The genesis of every true commercial crisis can be traced to such a disproportionate investment of capital in some particular branch or branches of trade and in speculation.

A money panic, on the other hand, may come at a time when trade is in a normal and sound condition. Anything which threatens to impair the quality of the money in circulation may dry up the springs of credit, cause extensive failures, and produce some of the phenomena of a commercial crisis. Such conditions existed in 1860 and 1861, when a large part of the circulating medium of the country was based on bonds of the Southern States, which were taking steps to secede from the Union. It cannot be denied that there was some unsound trade in 1893, but the one-sided development of industry and the top-heavy stage of speculation which mark the real commercial crisis were not general. On the other hand, the perils which menaced the standard of value were sufficient to account for the alarm and for most of the consequences that ensued.[1]

[1] "It is true that the years immediately preceding 1893, while they had been years of activity, had not shown the feverish speculation which commonly precedes the storm. Yet in some parts of the West, notably in Colorado, there had been wild gambling in land; and, what was probably more important, there had been in preceding years, from 1886 to 1890, a great deal of reckless investment in railways and in iron-making industries. Certainly some great railway corporations had

Two powerful causes contributed to the panic of 1893: (1) a deficiency of revenue, pointing to the necessity of using the gold reserve to meet the current expenses of the government; (2) a fear in the public mind lest there be a change in the standard of value. Yet, when the panic came, there was no observable tendency on the part of bank depositors to draw gold. What the frightened people wanted was the means of payment and especially the payment of wages. Government notes, bank notes, silver certificates, silver dollars, and subsidiary coins would meet this want as well as gold, and even better in some respects, because obtainable in the smallest denominations. All these things commanded the same premium as gold over certified bank checks in Wall Street. If there was any premium on gold over other currency, it was veiled under the rate of exchange. The government itself replenished its stock of gold to some extent by offering to deliver notes in New York in exchange for gold deposited in other cities, and *vice versa*. The cost of transferring the funds was a premium on gold.

Causes of the Panic.

On June 30, 1893, President Cleveland issued a call for an extra session of Congress expressly to repeal the Sherman Act. The time for meeting was August 7. A bill to repeal the silver purchasing clause was promptly passed by the House, by a vote of 239 to 108. In the Senate there was a long delay, due to the lack of any rule for terminating debate. It seemed at one time as though the country was on the eve of some great change, in consequence of the revolutionary conduct of certain senators in refusing to allow a vote to be taken.

End of the Silver Purchasing.

been living from hand to mouth for several years before 1893, borrowing heavily on short time, hoping for a turn in their favor, helped for a while by the favorable conditions of 1891 and 1892, and finally brought to bankruptcy by the panic." — TAUSSIG, pp. 138, 139.

But filibustering came to an end at last, and the repealing bill passed the Senate October 30, by 43 to 32.

The consequences of the panic did not come to an end, however. The Treasury deficit was not checked by the repeal of the Sherman Act. The gold reserve had declined from $99,000,000 in July, 1893, to $65,000,000 in January, 1894. This was due, not to the presentation of notes for redemption, but to an excess of ordinary disbursements over ordinary receipts. The deficit was now running at the rate of $5,000,000 per month. The cash balance in the Treasury other than gold was only $12,000,000. The situation was alarming.

"Coining the Seigniorage."

At this juncture some of President Cleveland's political friends, who had joined in repealing the Sherman Act, asked him to agree to a measure for coining, in advance, the seigniorage of the bullion purchased under that act. The whole amount of bullion purchased for $156,000,000 would produce 218,000,000 silver dollars. The difference between these two sums ($62,000,000) would be seigniorage whenever the coinage should take place, but the Sherman Act had not contemplated the coinage of the bullion at any definite time. If the seigniorage were coined in advance, the new silver dollars would be in the Treasury, and if paid out would aggravate the existing evil, like a new issue of greenbacks or of any other fiat money. If not paid out, people would naturally ask why they had been coined. Moreover, coining the seigniorage would have been interpreted as a sign of vacillation and weakness on the part of the Executive and would have added to the prevailing panic. For these reasons Mr. Cleveland properly refused to give his assent to the proposed measure.

When Congress met in regular session in December, 1893, Secretary Carlisle laid before it the exact condition

of the Treasury, and recommended that his borrowing powers be enlarged and modernized by giving him authority to issue government obligations bearing 3 per cent interest and redeemable in one year. Such obligations would be akin to the Exchequer bills issued in emergencies by the British government. But Congress was in a sullen mood. The Democrats were angry with President Cleveland for compelling them to repeal the Sherman Act. The Republicans could see no objection to a family quarrel among their opponents or to the pecuniary embarrassment of the Administration. If the Secretary could extricate himself by means of existing laws, well and good; otherwise the government might go to protest. Neither branch of Congress would lift a finger to prevent it.

Indifference of Congress.

It was now necessary to do something decisive. Under the Resumption Act of 1875 the Secretary had power to sell any one of three classes of bonds for the purpose of beginning and continuing the redemption of United States notes. Another law, not noticed at the time, gave him power to buy coin at his discretion and to pay for it with any bonds authorized by law. In January, 1894, the Secretary advertised, under the act of 1875, the sale of $50,000,000 of 5 per cent bonds, to run ten years and to be sold at the rate of $117.223 gold for each $100, thus making the rate of interest equal to 3 per cent. These were taken mostly by the New York City banks. In this sale the element of coercion was not wholly wanting. The banks were not free to take the bonds or not, according to the attractiveness of the investment, but were obliged to consider what would happen to themselves, in common with the commercial world, if the loan should fail. When they looked at that side of the shield, they saw sufficient reasons for lending their money to the government

Bond Sales in 1894.

at 3 per cent. The sale brought in $58,660,917, and the Treasury gold reserve was carried up to $107,446,802 in March, but it did not remain there long. Gold exports began again in April and continued heavy till September. The withdrawals reduced the Treasury reserve to $52,189,500 in August. The Secretary was compelled to advertise a new sale of $50,000,000 of bonds. This was effected in November, 1894, at 117.077, realizing $58,538,500, and bringing the Treasury reserve up to $105,424,569.

The second loan did not have a soothing effect. On the contrary, it convinced the public on both sides of the water that the United States was nearing bankruptcy. In the midst of the trouble, a rumor gained acceptance in Wall Street that the Treasury officials were keeping a list of the persons who drew gold, intending to visit displeasure on them later. This was naturally interpreted as a sign of panic inside the Treasury. It augmented the panic outside and led to larger withdrawals of gold than would otherwise have taken place. In the ten weeks following the second loan, $80,000,000 gold was drawn from the Treasury. Of this sum $36,852,000 was exported, and the remainder, $43,148,000, was presumably hoarded. This was a run on the Treasury, the like of which had not been known before.

The danger had come so rapidly that steps for a new loan had not been taken in time to ward off the crisis. There was a gloomy conference at Washington between the President, the Secretary and two or three bankers from New York. The President was told that another sale of bonds by advertisement would require at least two weeks' public notice and that, meantime, the Treasury would have suspended payments. The assistant treasurer in New York had, in fact, notified the Secretary that he could not hold out more than two days longer, as things were then going. President Cleveland did not believe that

he had legal authority to sell bonds in any other way than in pursuance of public advertisement and competing bids, but at this juncture, Mr. W. E. Curtis, assistant secretary of the Treasury, drew attention to the following clause of the Revised Statutes:

SEC. 3700. The Secretary of the Treasury may purchase coin with any bonds or notes of the United States authorized by law, at such rates and upon such terms as he may deem most advantageous to the public interest.

A sudden change came over Wall Street. Gold withdrawals from the Treasury, which in January had ranged from $1,000,000 to $7,000,000 per week, fell on the 2d of February to $67,000. News came from Washington that the President had made an arrangement with a syndicate of American and foreign bankers, under the statute above cited, to provide the Treasury with 3,500,000 ounces of gold coin, equal to $65,117,500; that at least one-half of this gold should be brought from Europe, at the rate of 300,000 ounces per month, and that the syndicate should "exert all financial influence and make all legitimate efforts to protect the Treasury of the United States against the withdrawals of gold pending the complete performance of this contract." The bond deliveries were to be made concurrently with the payments, and the terms of the contract allowed six months for its entire fulfillment. This signified that, besides replenishing the Treasury, the syndicate had undertaken to stop the export of gold for six months, or at least to use all their financial powers to that end. This coin was to be purchased with 4 per cent thirty-year bonds at 104.49, at which rate the interest would be equal to $3\frac{3}{4}$ per cent. The syndicate, however, agreed to accept 3 per cent interest instead of $3\frac{3}{4}$ per cent, if Congress would make the bonds specifically

Bond Syndicate of 1895.

payable in gold. President Cleveland sent the contract to the House, with a recommendation that this change be made, saying that it would save the government $16,174,770 in interest payments during the time the bonds would run; but the House rejected the proposition, by 120 to 167.

By this transaction the Treasury's gold reserve was brought up to $107,000,000, and the syndicate did actually prevent withdrawals from the Treasury for remittance abroad for four or five months, although the rate of exchange would have warranted gold shipments. This they accomplished by using their own credit in London and selling sterling exchange at the current rate. But their ability to continue this operation depended upon the state of international trade in merchandise and securities, and eventually the demand for remittances on trade account became so heavy that they could not supply it by their own credit merely. The withdrawals for export began again on a large scale in August, and the reserve was down to $79,000,000 at the beginning of December.

The syndicate operation of 1895 was assailed with vehemence in Congress, on the ground that the terms were too onerous to the government. This objection was urged for the most part by men who, by refusing to make the bonds payable in gold, had themselves added $16,000,000 to the public burdens. It is true that the syndicate loan was onerous, as compared with those immediately preceding, but the reason was that it came at a time when the public credit was at a low ebb.[1]

[1] In a monograph entitled "Appreciation and Interest" (*Publications of the American Economic Association*, August, 1896), Professor Irving Fisher presents a table showing the rates of interest realized on silver bonds (rupee paper) and on gold bonds of the Indian government in the London market from 1865 to 1895. Until 1875 the difference was slight, not greater perhaps than might be accounted for by the

While the financial world was in the sensitive and strained condition indicated above, President Cleveland (December 17, 1895) sent a message to Congress on the subject of the boundary line between Venezuela and British Guiana. The message was construed as a threat of war against Great Britain in certain contingencies. There was an immediate panic in Wall Street, accompanied by renewed exports of gold. The President again appealed to Congress (December 20) not to adjourn for the holidays without having "done something" to quiet the apprehensions of the public at home and abroad as to our financial soundness and honesty. Congress was willing to pay the expenses of a commission to determine the boundary of British Guiana, but would do nothing to ward off national bankruptcy. The holiday recess took place as usual. Meanwhile the withdrawals of gold from the Treasury were increasing, $20,000,000 being taken in December, of which $15,000,000 was exported. In January the reserve had fallen to $49,800,000.

Panic of 1895.

On January 6, 1896, the Secretary of the Treasury advertised the sale of $100,000,000 of 4 per cent 30-year bonds. The loan was largely oversubscribed and was taken at the average price of 111.166, at which rate the interest was equal to 3.39 per cent. After the payments had been made, the Treasury reserve stood at $128,000,000. Exports of gold continued till August, when the reserve fell to $100,957,561. This was

$100,000,000 Bond Sale.

preference of investors for payment in London instead of Calcutta. In 1876 the decline of silver had become disturbing. Silver bonds sold at a rate which realized 4.1 per cent to the investor and gold bonds 3.7 per cent; in 1890 silver 4 per cent, gold 3 per cent; in 1895, silver 3.4 per cent, gold 2.8 per cent. The difference in the last-named year was 0.6 per cent, which was approximately the difference that the bond syndicate of 1895 offered to make between a gold bond and a "coin" bond of the United States.

within a small fraction of the sum turned over to Secretary Carlisle by his predecessor, Mr. Foster. Meanwhile the sum of $293,481,894 had been borrowed. The deficiency of revenue in the fiscal years 1894, 1895 and 1896 was $137,811,730, and the whole amount of money spent for silver bullion under the Sherman Act was $155,981,002. It is noteworthy that these two sums together equal the government's borrowings, within a small fraction. If the difficulties of 1893–96 had been merely those of a deficiency of revenue, probably all parties would have coöperated to bring them to an end by means of increased taxes and a temporary loan. But since the standard of value, the principal political issue of the day, was involved in the solution of the fiscal problem, no such coöperation was possible.

The Sherman Act provided that two million ounces of the bullion purchased should be coined into silver dollars each month until July 1, 1891, and that thereafter only so much should be coined as might be necessary to provide for the redemption of the Treasury notes issued to buy the bullion. It provided also that the amount of Treasury notes outstanding should be neither greater nor less than the cost of the silver bullion and the silver dollars coined therefrom then held in the Treasury. Accordingly, when any Treasury notes were redeemed with silver dollars, it would be necessary to cancel them, in order to make the notes still outstanding equal to the silver still in the Treasury. If redeemed with gold, the notes would be reissued. As there is no provision for restoring canceled notes, it follows that the total amount of them in existence must be diminishing in exactly the ratio that redemption of them with silver takes place. This process, as explained in the preceding chapter, has been accelerated by the acts of 1898 and 1900.

Coinage of the Silver Bullion in the Treasury.

Under the acts of 1878 and 1890 the purchases of silver were as follows:

Silver bullion purchased under the act of February 28, 1878, fine ounces		291,272,018
Total coinage of silver dollars under said act		$378,166,793
Total cost of silver bullion used in such coinage		$308,279,261
Silver bullion purchased under the act of July 14, 1890, fine ounces		168,674,682
Cost of same		$155,981,002
Silver dollars coined and to be coined therefrom	$218,000,000	
Less subsidiary coinage	20,000,000	
		$198,000,000
Total coinage of silver dollars under both acts		$576,166,793

Act of 1900.

The first section of the act of March 14, 1900, says that all forms of money issued or coined by the United States shall be maintained at a parity of value with the gold standard, and that "it shall be the duty of the Secretary of the Treasury to maintain such parity." It does not provide any means, however, by which to maintain parity. This omission is the more remarkable since the bill as originally reported and passed by the House contained a clause expressly for that purpose.

Direct Redemption of the Silver Dollar Desirable.

The silver dollar is a larger kind of subsidiary coin, and should be treated by the government exactly as the smaller ones are treated. The government has received the value of a gold dollar for every silver one emitted, and is therefore bound in equity to redeem the dollars as it redeems the halves, quarters, and dimes. It is not strictly necessary that the small change should be redeemed, but it is a great public convenience, as is shown by the fact that the redemptions amount to upwards of $32,000,000 per year.[1] The

[1] See Treasurer's report for 1900, p. 32.

government exists for the benefit of the people, and the cost of making the redemptions has been paid in advance by the seigniorage on the coins.

There are additional reasons, however, for direct redemption of the silver dollars. One is that such coins are unlimited legal tender between individuals. Another is that there is a certain amount of public apprehension and lack of confidence touching any coin which passes for more than its metallic value. This fear would be removed by direct redemption of the silver dollar. If such redemption were provided for by law, it would never be availed of except in cases of necessity. In such cases it would be universally desired.

The silver dollar has so far ceased to be a political issue that the future disposition of it may soon be decided on economic grounds alone. In 1904 a bill was introduced in Congress, with the approval of the Secretary of the Treasury, to convert silver dollars into subsidiary coins as fast as the latter are needed. The annual increment of subsidiary silver due to the growth of population and retail trade is about $5,000,000. If the policy were adopted of recoining the dollars into smaller pieces instead of buying new bullion therefor, the government would eventually recover the money that was expended under the Bland and Sherman acts, and the silver dollar would cease to be an object of suspicion and alarm in financial circles. The silver thaler pieces of Germany are in this way rapidly disappearing under the Treasury order of the year 1900, mentioned on page 66 *ante*.

RECAPITULATION

In 1873, by an act of Congress revising the coinage laws, the silver dollar was omitted from the list of coins authorized to be struck at the mint of the United States. At that

time the metal in a silver dollar was worth more than 100 cents gold. Any silver dollars previously coined remained full legal tender, but the metal silver was demonetized by that act.

There was a gradual decline in the value of silver after 1873. In 1876 the price had fallen so that the metal in a dollar was worth only 89 cents. There was a movement in Congress and a popular agitation to remonetize silver. A bill for this purpose was passed by the House in 1877, and was amended by the Senate so as to provide for a limited coinage of silver dollars from bullion purchased by the government. In this form it became a law February 12, 1878. It did not remonetize silver, since it did not authorize the coinage of that metal in unlimited quantities for private persons. It was entitled "an act to authorize the coinage of the standard silver dollar and to restore its legal-tender character," but the phrase "standard silver dollar" was misleading, since the silver dollar had ceased to be a standard and was not made such by that act. The act remained in force about thirteen years. Under it the government paid $308,000,000 for silver bullion, from which it coined 378,000,000 silver dollars, which it paid out of the Treasury at par. The seigniorage, or apparent profit, was about $70,000,000.

In 1890 the act of 1878 was repealed and another act was passed, enlarging the government's purchases of silver bullion and providing that payment be made with legal-tender Treasury notes, which should be redeemable in "coin." This act remained in force about three years. Under it the government issued its legal-tender notes to the amount of $156,000,000. Simultaneously with this act a bill was passed making changes in the tariff by which the revenues of the government were largely reduced, and a deficit became inevitable.

The output of legal-tender notes was accompanied by an exportation of gold of about equal magnitude. The reserve of gold in the Treasury known as the greenback redemption fund fell below the $100,000,000 mark in April, 1893. A financial panic ensued. It was succeeded by a severe and prolonged commercial crisis, during which it became necessary for the government to sell bonds on four different occasions to replenish its gold reserve. Congress was called together in extraordinary session in the summer of 1893 to repeal the silver act, and it did so. It refused, however, to take any other steps to improve the public credit, although repeatedly urged to do so by the President and the Secretary of the Treasury. The reason why it refused was that the standard of value was the leading issue in national politics. Anything tending to improve the public credit helped the gold standard, which the majority in Congress at that time did not desire.

The following statistics embrace facts of importance:

Gold drawn from the Treasury by redemption of legal-tender notes in 14 years, 1879–92 inclusive	$43,310,887
Gold drawn in 4 calendar years, 1893–96	483,538,788
Gold exported during same period	344,248,036
Borrowed by the government, same period	293,481,894
Bonds issued, same period	262,315,400

Bonds issued for gold redemption fund and interest thereon:

Principal	Interest
$100,000,000 at 4 per cent for 30 years, original loan (1878)	$120,000,000
50,000,000 at 5 per cent for 10 years (1894)	25,000,000
50,000,000 at 5 per cent for 9 years (1894)	22,500,000
62,315,400 at 4 per cent for 30 years (1895)	74,778,480
100,000,000 at 4 per cent for 30 years (1896)	120,000,000
$362,315,400	$362,278,480

The greenbacks are only $346,000,000 in amount, yet to keep them alive and to keep them equal to gold we have issued $362,000,000 of bonds and have obligated ourselves for $362,000,000 more in the way of interest, and we still owe the amount of the greenbacks.[1]

The silver dollar is at par with gold at the present time because it is not redundant. Moreover, the government receives it as the equivalent of gold in payment of all dues to itself. This is an indirect redemption, yet it cannot be depended on to maintain parity under all circumstances. If, by reason of bad times and slack trade, the quantity of silver dollars and certificates should be greater than the business of the country could absorb and find employment for, they would accumulate in the Treasury. Eventually the government's receipts would be wholly of silver and a panic of more or less severity would be the probable consequence.

Authorities for Chapters V and VI

Noyes' *Thirty Years of American Finance.*

Taussig's *Silver Situation in the United States.*

Final Report of the Monetary Commission of the Indianapolis Convention (The University of Chicago Press, 1898).

Dunbar's article on "The Safety of Legal-Tender Paper" in the *Quarterly Journal of Economics*, April, 1897.

Dunbar's *Collection of Laws of the United States relating to Currency, Finance, and Banking.*

[1] An official estimate by the chief of the Loan and Currency Division of the Treasury Department, published in the *Congressional Record* of April 29, 1908, p. 5638, shows that if the greenbacks had been funded on the first day of January, 1879, into 4 per cent thirty-year bonds and canceled, the total cost to the government for principal and interest to July 1, 1907, would have been $741,897,340; whereas the total cost and liability actually incurred on account of them has been $1,081,881,562; the difference in favor of converting into bonds being $339,984,222.

BOOK III

BANKING

CHAPTER I

FUNCTIONS OF A BANK

In its original sense the word "bank" means a heap, a pile, an accumulation, as bank of earth, sand bank, gravel bank. In colonial times it was applied to any batch or accumulation of paper money. Thus a "new Rhode Island bank" meant a new emission of bills of credit of that colony. In the early days of the American republic a bank was an association whose main business was the issuing of notes to circulate as money, and the phrase "banking privileges" meant the right to issue such notes. Daniel Webster even said that the power to issue notes to circulate as money was the feature which distinguished a bank from every other institution. At the present time the issuing of notes is not a necessary function of banks, nor is it, in our large cities, the chief part of their business.

Original Meaning of the Term.

A bank in the modern sense is a manufactory of credit and a machine for facilitating exchanges. It is commonly said that banking consists in receiving money from depositors and lending it to borrowers. This is the proper function of a savings bank; but it is only a part, and not the largest part, of the business of a commercial bank. The money deposited in such a bank forms only a portion of the assets which go to make up the bank's credit, which it issues

to borrowers, sometimes in the form of circulating notes payable to bearer, but oftener in the form of book entries transferable by means of checks.

An analysis of modern banking is substantially this: A man has $10,000 of his own money. He starts a bank. His neighbors deposit $50,000 with him. This money becomes the absolute property of the banker. The depositors have simply a right to withdraw an equal amount whenever they like, which right can be enforced by law. The banker owns the money and the depositor has a claim, or right of action, against him for an equal sum. But the depositors will not draw the money out immediately; if they had intended to do so, they would not have deposited it at all. The banker finds by experience that some of his customers will bring in as much money as others draw out, so that $60,000 is on hand all the time. He infers that if his own $10,000, in connection with his good reputation, is considered by the public a guarantee for $50,000, then the whole $60,000 will serve as a guarantee for a much larger sum. When he begins, his balance sheet reads in this way:

A Manufactory of Credit.

Resources		Liabilities	
Cash . . .	$60,000	Capital . . .	$10,000
		Deposits . . .	50,000
	$60,000		$60,000[1]

[1] In keeping the accounts of a bank, or of any other business, the business itself is considered as indebted to the shareholders for the money they have put into it, and for all the profits earned but not paid to them. In the case we are now considering, although there is only one shareholder, the same rule applies. The conception of a bank's capital as a liability is the *pons asinorum* of banking science. It can be understood best perhaps by observing how the assets of a failed bank are disposed of. The receiver, in such a case, represents the bank. Suppose that the assets realize more than the claims of all the creditors. The excess is paid to the shareholders because the bank *owes* them whatever remains after other claimants are paid in full. In short, there

The banker now begins to buy promissory notes, or bills of exchange, due at a specified time in the future, paying the face value of the same, minus interest at a certain rate for the intervening time. This is called discounting commercial paper. When he discounts for one of his customers a note for $1000 running ninety days, he deducts the interest (say $15), entering the amount under the head of profits due to stockholders, and writes the remainder, $985, on the credit side of the customer's pass book, entering a corresponding sum as a credit to that person's account in his own books. This credit is called a deposit, and properly so, since the net purport of the transaction is that the banker has bought an interest-bearing security and the seller has deposited the money he received for it in the bank, to be drawn out at his pleasure. If the customer had deposited $1000 gold simultaneously with the foregoing transaction, his total deposit would have been $1985. Yet there is a difference between the two kinds of deposits, the one being of money and the other a bank credit. In practice, the bank credits at any given time may be four or five times as large as the amount of cash in the bank.

Discounting Commercial Paper.

Two Kinds of Deposits.

The process of discounting commercial paper continues until the banker has $200,000 of bills receivable in his portfolio. Then his account stands thus:

Resources		Liabilities	
Cash	$60,000	Deposits .	$247,000
Loans and discounts	200,000	Capital .	10,000
		Profit . .	3,000
	$260,000		$260,000[1]

are preferred claims (those of creditors) and ordinary claims (those of shareholders). Both are liabilities of the bank, and equally valid ones, in their proper order.

[1] *Theory and Practice of Banking*, by Henry Dunning Macleod (fifth edition), I, 324.

Thus the business venture called a "bank" owes to depositors and to the banker himself $260,000; and it has assets which will produce that amount, but only $60,000 of it is cash. It follows that the banker has manufactured something which serves as a medium of exchange to the extent of $197,000. This is credit. Goods can usually be bought and sold with it as readily as with money, since checks drawn against deposits are accepted in trade by the whole community. The whole $200,000 of bills are not discounted at one time, but gradually, so that some are always maturing and bringing in money to meet the banker's liabilities.

Utility of Bank Credits

Alexander Hamilton saw clearly how a bank serves as a manufactory of credit, and how it economizes the use of capital. He had a clear understanding of the nature of deposits, although there had not yet been published any scientific analysis of banking operations. In his report on the Bank of the United States he said:

> Every loan which a bank makes is, in the first shape, a credit given to the borrower on its books, the amount of which it stands ready to pay, either in its own notes, or in gold or silver, at his option. But, in a great number of cases, no actual payment is made in either. The borrower, frequently, by a check or order, transfers his credit to some other person, to whom he has a payment to make; who, in his turn, is as often content with a similar credit, because he is satisfied that he can, whenever he pleases, either convert it into cash, or pass it to some other hand, as an equivalent for it. And in this manner the credit keeps circulating, performing in every stage the office of money, till it is extinguished by a discount with some person who has a payment to make to the bank, to an equal or greater amount. Thus large sums are lent and paid, frequently through a variety of hands, without the intervention of a single piece of coin.[1]

[1] Although this lucid conception of the philosophy of modern banking was published in 1791, it was the task of Mr. H. D. Macleod (and not

The banker's deposits are payable on demand. In the case considered above, the depositors might have drawn their checks simultaneously for $247,000, payable to persons who were not depositors in the same bank, in which event they could not all have been paid, although the bank would be eventually solvent. It would be able to pay in full, but not until its bills receivable should mature. Probably such a case as a simultaneous withdrawal of all deposits never happened in the world, but it is quite conceivable that the depositors might draw at once for more than $60,000, — that is, for more cash than the banker has on hand, in which case the bank would have to close its doors.

Limit to Bank Credits.

Thus there is a limit to the banker's power of discounting commercial paper. He is limited by the probable calls of his depositors for money to be withdrawn from the bank. The amount kept on hand to meet such demands is called the cash reserve. This reserve is *the bank*, in the original meaning of the term, — the heap, or pile, from which daily payments are made and upon which all the credit operations rest. The cash reserve may consist of any kind of currency which is commonly accepted, but preferably of legal-tender money, not the notes of other banks. Its amount must be proportionate to that of the deposits. The right proportion can be learned only by experience and only approximately. It varies in different countries, and at different places in the same country; and the local banker, as the person most thoroughly conversant with local conditions, has, as one of his most important duties, the ascertainment and preservation of that reserve which most nearly meets the needs of his community.

Bank Reserves.

an easy one) to systematize and bring it into general recognition and acceptance by economists more than half a century later.

Bank notes are the banker's promises to pay money to bearer on demand. They are virtually orders of the president and cashier on the paying teller. They are of the same nature, and they operate in the same manner as checks drawn by depositors. Checks and notes are equally lawful demands upon the bank's cash reserve.

Bank Notes.

Now, suppose that the bank above mentioned has the right to issue circulating notes and that the customer, whose paper has been discounted, desires to use the proceeds in paying the wages of farm hands, or factory operatives, or in buying country produce, or in other ways and in places where checks are not acceptable. He will ask for bank notes, in order to pay them to the wage-earners, farmers, etc. He might ask for gold, in which case the bank would be obliged to give it to him, but the notes are more convenient and will be generally preferred by the payees. The payees may demand gold from the bank for the notes, if they choose, but generally they will not do so. They will pay them to storekeepers or others to whom they are indebted, and the latter will deposit them in the issuing bank to their own credit, or in other banks which will send them to the issuing bank for redemption. Eventually they will be paid out of the bank's cash reserve. They will be paid out of the same fund from which the customer's checks would have been paid, if he had drawn the money by means of checks payable to order, instead of taking notes payable to bearer.

Of the Same Nature as Checks.

The banker cannot decide whether the credit he has extended to his customer shall be used in the form of checks or in the form of notes. Nor does this question concern him in any way, except that the notes may stay out somewhat longer than the checks. His liabilities are the same in either case. The only thing that need concern him is

the goodness of the paper which he bought when he issued his credit to his customer. The form of issue, whether in checks that may pass through one or two hands, or in circulating notes that may pass through many hands, is of little consequence; and, even if it were of much consequence, it is beyond his control. It is also beyond the control of the depositor. He will call for notes only in cases where he cannot use checks. The controlling force here is the public demand, to which both the banker and his customers conform. The public demand determines also how long the notes shall stay out after they have been issued. Nobody keeps more notes on hand than he needs. When a man finds that he has a surplus, he returns it to the bank. Thus the outflow and inflow of bank notes is automatic.

Issue of Notes Automatic.

While it is immaterial to the banker whether the credit which he issues shall take the form of checks or of notes, it is important both to him and to the community that it shall take one form or the other, since the alternative is the withdrawal of gold for purposes of circulation and the consequent lessening of his cash reserve; and, as we have seen, the lessening of his reserve by $1.00 usually lessens his ability to discount commercial paper by $4.00 or more. If it is for the interest of the community that the system of bank credits should exist at all, it should be available in the form of circulating notes, as well as of checks; for banking science consists in the substitution of less costly instruments of exchange for more costly ones, according to the demands of trade. The bank note, since it is one of the less costly ones and is indispensable in the modern world, should be readily available as needed. Its utility is greatest in sparsely settled communities, where there are few or no banks.

Utility of Bank Notes.

Bank notes were first issued in England in 1670 or thereabouts. They were instruments of writing executed by goldsmiths to people who had left money in their custody. Several of these notes were found in a back room of Child's Bank (the oldest of English banking houses) when it was removed from the vicinity of Temple Bar a few years since. The following are specimens:

Evolution of Bank Notes.

Nov. 28, 1684.

I promise to pay unto ye Rt. honble ye Lord North & Gray, or bearer ninety pounds at demand.

For Mr. Francis Child & myself
Jno Rogers.

Picture of Temple Bar } No 921.

London, Oct. 20, 1729.

I promise to pay to Mr. Richard Bannister, or order, on demand, twenty pounds.

For Fras. Child, Esq.
Sam Child.

Picture of Temple Bar } No 1792.

London, 8 December 1729.

I promise to pay to Mr. Chr. Diggs, or bearer, on demand thirty pounds.

For Fras. Child & Co.
Sam Child.[1]

Other similar examples of the origin and evolution of the bank note might be cited. The right to issue such notes was never questioned. They were simply evidences of claims to money deposited with the goldsmith or the bank. As the business grew, and the quantities of notes called for by depositors increased, it became more convenient to print blank forms, to be filled out with the names of the depositors and of the amounts due them. Still later notes were printed

[1] Macleod, I, 283.

for round sums, — as, for example, five or ten pounds, — which could be handed in quantities to the persons entitled to receive them ; and these were made payable to bearer, or to order, according to the wish of the depositor. The business of discounting commercial paper was added to the goldsmith's vocation very soon after the practice of depositing money with him became common, and then the notes were issued, if desired, to the persons getting the discounts.

Thus the issuing of such notes became recognized as a right at common law. Anybody could issue them and put them in circulation, if people were willing to take them. It was found in course of time that the exercise of this right was exposed to accident and liable to abuse, and that the State must interpose for the protection of society. At first it was believed that such protection could be secured by restricting the issue of circulating notes to a select number of persons of well-known character, generally, but not always, incorporated as a bank. Thus certain charters granted to banks in this country before the adoption of the federal constitution (the Bank of North America in Philadelphia, the Bank of Massachusetts, and the Bank of New York, which still exist) contain no mention of circulating notes, since the right to issue them existed without legislative authorization. The Bank of New York began business and issued circulating notes seven years before it received a charter.

A Common-Law Right.

In the public discussions of recent years the question has frequently been asked why the banker should receive interest on his outstanding notes, while the customer pays interest on the note which he gave in exchange for them. As both kinds of notes are debts, why should one of these two persons pay interest more than the other? There is, however, a vital difference between the two kinds of notes. The

Why Interest is paid for the Use of Bank Notes.

banker's notes are payable on demand. Any person into whose hands they come may demand gold for them immediately. If he does not do so, it must be because he finds the notes better adapted to his immediate wants. The customer's note, on the other hand, is not payable till a fixed time in the future. It is said in rebuttal that the right to issue notes to circulate as money has been conferred upon one of these parties by statute, and that he has thus been given an artificial advantage. This is an error; for, as we have seen, the statute, instead of conferring a right on the banker, has curtailed a preëxisting right.

Society derives an advantage from the banker's operations which it can well afford to pay for, whether the credit which he issues takes the form of deposits and checks, or of circulating notes. The discount of commercial paper has been aptly defined as "the swapping of well known credit for less known credit." The bank first establishes its own credit. Then it is the banker's business to find out what persons in the community are worthy of its credit. Credit enables persons to obtain the use of capital which they could not otherwise acquire. For the present purpose capital may be defined as anything which aids man to produce wealth and is not gratuitously bestowed, such as tools, materials, food, etc. The banker, if he understands his trade, enables the most deserving persons in the community to get capital, — that is, to get possession of the tools and materials of industry without the use of money. The most deserving persons, in the commercial sense, are those who can make the most profitable use of tools and materials, and who are believed to be honest. By swapping its well known credit for their less known credit the bank performs a service which they are willing to pay for, and it performs a service to society by economizing tools and materials.

How Banks aid in the Work of Production.

Anything which puts these things into the right hands and keeps them out of the wrong hands is a gain to the world. The continuing life of a bank is presumptive evidence that it is doing this thing, for, if it were not, its own losses and expenses would eat it up.

RECAPITULATION

A bank is an institution where deposits of money are received and paid, where credit is manufactured and extended to borrowers, and where the exchange of property is facilitated. Having first acquired the confidence of the community, the bank extends its credit by purchasing interest-bearing securities, mainly business men's notes, payable at a fixed time and giving the sellers the right to draw checks upon itself payable at sight. The amounts thus authorized to be drawn are termed deposits, the bank being liable for them in the same way as for actual money deposited. It is found in practice that a bank may safely extend its credit to an amount much larger than its cash on hand, the excess being an inexpensive but useful addition to the world's instruments of exchange.

A bank requires a certain amount of money over and above its deposits as a capital, to secure and hold the confidence of the community and to meet unforeseen emergencies in business, but there is no definite proportion between capital and deposits established either in law or in practice. The capital invested is one of the liabilities of the bank, but as a lien on the assets is secondary to the claims of creditors.

Bank notes are the bank's promises to pay money to bearer on demand. They are the president's checks on the bank, and are payable out of the cash reserve, the same as checks drawn by customers. When the bank extends its

credit to a customer, it is of little consequence whether the credit shall be used in the form of checks or of notes. The bank's liability is the same in either case, but notes usually remain in the hands of the community somewhat longer than checks.

Bank notes were originally instruments of writing, executed by goldsmiths or other persons, promising to return the specific sums of money lodged with them. The right to issue them was consequent upon the right to receive the money deposited, and thus became recognized as a right at common law. In the early years of our government the right of a bank to exist carried with it the right to issue circulating notes. At present the right to issue notes is restricted in various ways in all civilized countries. For wholesale and for many kinds of retail, trade bank checks are the most convenient means of payment, but for paying wages or carrying on some kinds of business notes are preferred. It is the public demand, not the preference of either the banker or his customer, that decides what proportion of payments shall be made with checks and what with notes. The public demand also determines how long the notes, when taken out of the bank, shall remain in circulation. Bank notes are most useful in rural communities where banks are few and population is sparse.

Authorities

Macleod's *Theory and Practice of Banking.*
Dunbar's *Chapters in the Theory and History of Banking.*
Conant's *History of Modern Banks of Issue.*

CHAPTER II

A BANK STATEMENT

A BANK statement is an accounting, either voluntary or compulsory, rendered by the bank's officers to its shareholders, which is published for general information. The bank, as an institution, is liable for all balances which have accrued against it in the course of business and is also liable to the shareholders for the capital and for all profits, whether carried to the surplus fund or not. Thus there are two kinds of liabilities, though they are generally put under a single head. We will, however, separate them for the sake of clearness, taking for illustration a statement of one of the national banks of New York City dated September 30, 1901.

RESOURCES

1.	Loans and discounts		$48,719,212.94
2.	Overdrafts, secured and unsecured		32,507.06
3.	United States bonds to secure circulation		50,000.00
4.	Stocks, securities, etc.		309,720.99
5.	Banking house, furniture, and fixtures		1,414,250.00
6.	Other real estate owned		14,667.85
7.	Due from national banks		5,904,767.29
8.	Due from state banks and bankers		373,772.55
9.	Checks and other cash items		361,627.10
10.	Exchanges for clearing house		5,011,772.87
11.	Notes of other national banks		11,500.00
12.	Lawful money reserve in bank, *viz.*:		
	Specie	$11,905,413.29	
	Legal-tender notes	2,297,826.00	
			14,203,239.29
13.	Redemption fund with United States Treasurer (5 per cent of circulation)		2,500.00
14.	Due from United States Treasurer, other than 5 per cent redemption fund		16,000.00
	Total		$76,425,537.94

LIABILITIES

To Creditors

15.	Individual deposits	$29,923,255.97
16.	Due to other national banks	26,368,474.36
17.	Due to state banks and bankers	7,905,820.09
18.	Due to trust companies and savings banks	4,372,752.72
19.	Demand certificates of deposit	135,205.69
20.	Certified checks	906,907.57
21.	Cashier's checks outstanding	794,499.40
22.	National bank notes outstanding	49,500.00

To Shareholders

23.	Capital stock paid in	2,000,000.00
24.	Surplus fund	2,500,000.00
25.	Undivided profits, less expenses and taxes paid	1,468,657.14
26.	Dividends unpaid	465.00
	Total	$76,425,537.94

1. Loans and discounts consist chiefly of promissory notes, drafts, and bills of exchange, running for short periods — say, two to four months — executed by men engaged in active business. As the liabilities of a commercial bank are payable on demand, it cannot safely make loans for long periods, although it may renew short ones from time to time. Promissory notes may be executed by one person, firm, or corporation and offered for discount without other security. Such notes are called single-name paper. A promissory note drawn by A to the order of B, indorsed by the latter and offered for discount, is called double-name paper, since both A and B are held for the payment of it.

Loans and Discounts.

Such paper, whether single or double-name, may or may not have its origin in a sale of goods on time, for which the seller wishes to obtain the money at once. If it does not take its rise in any business transaction already concluded, it is called accommodation paper. Bankers have

no absolutely certain means of knowing whether a note represents a concluded transaction or an intended one. They are justly suspicious of accommodation paper, yet the difference between such paper and other unsecured notes is not so great as it seems. Both are loans on personal security, since in neither case has the banker a lien on any particular goods.

Accommodation Paper.

The essential distinction between real and accommodation bills is that one represents *past* and the other *future* transactions. In a real bill goods *have been* purchased which are to meet the bill; in an accommodation bill goods *are to be* purchased which are to meet the bill. But this is no ground for preference of one over the other. A transaction which *has been done* may be just as wild, foolish, and absurd as one that *has to be* done. The intention of engaging in any mercantile transaction is that the result should repay the outlay with profit. There is no other test of its propriety but this, in a mercantile sense. The true objections to accommodation paper are of a different nature. As real bills arise out of the transfers of property, the number of them must be limited in the very nature of things. However bad and worthless they may be individually, they cannot be multiplied beyond a certain extent. There is therefore a limit to the calamities they cause. But accommodation bills are means devised to extract funds from bankers to speculate with, and consequently these speculations may be continued as long as these funds can be extracted.[1]

The Scotch banks have a system of "cash credits" which consist largely of accommodation paper. There are ten banks in Scotland, with about nine hundred branches, bringing at least one branch within reach of every hamlet in the country. The cash credits are authorizations granted to persons to draw a maximum amount of money from the bank within a given time and returnable within a given

[1] Macleod, I, 308.

time, interest to be paid only for the amount drawn and the time it is kept out. These are loans on personal security, never less than two names being required, generally three or more. A very large percentage of the cash credits of the Scotch banks are made to the agricultural classes, but they are not made on mortgage security and they are not allowed to stagnate. The cash credits are entered as deposits on one side of the bank's ledger — that is, under the head of liabilities. On the other side they appear under the title "bills discounted, cash accounts and other advances," as resources.

"Cash Credits."

Drafts and bills of exchange payable at a future time and purchased by the bank are included under the head of loans and discounts. In this country the two terms signify the same thing, except that the word "draft" is applied to instruments payable at some distance from the drawer but within the United States, and the term "bill of exchange" to those payable in foreign countries. They are orders in writing, drawn upon the custodian of funds belonging to the drawer or for the payment of goods sold to the drawee.

Drafts and Bills of Exchange.

A draft or bill of exchange is usually made payable to the order of a third person. If not payable at sight, it must be presented to the drawee as soon as possible, and he must write the word "accepted" on it and sign his name thereunder; otherwise it must be at once protested for non-acceptance. Then two persons are responsible to the holder of it. If the holder gets it discounted at his bank, he must indorse it, and thus he also becomes responsible for it. It may go through several hands, each holder indorsing it before he parts with it. It acquires strength with each transfer, since all the persons who have indorsed it are successively responsible for its payment. These are the most important circulating

Acceptances.

instruments of modern commerce, since nearly all the wholesale transactions of the world are effected by them, and since they range over the whole world and are not limited, like bank notes, to their parent country. Two or more bills of exchange may be in existence at one time touching one lot of goods, since it is the transfer and not the creation of them that gives rise to the bills. The chief business of banks is to discount bills of exchange, so that the maker or holder may have the present value of them in cash.

Bills of Lading.

Bills of exchange are sometimes accompanied by bills of lading, warehouse receipts, stocks or bonds, which are specific titles to property, the bank having a lien on the property until the bill is paid. These are simply a superior kind of bills. They command a lower rate of interest because of their higher security, and in a stringent money market they will command money when other bills are refused. All other discounted bills are loans on personal security.

Letters of Credit.

Another variety of bills of exchange arises from the use of letters of credit. These are instruments of writing issued by a bank, authorizing the holder to draw upon the issuing bank or upon some affiliated institution, at sight or otherwise, and within a definite period of time, not exceeding in the aggregate a certain sum. It is stipulated in the body of the instrument that the amount of all drafts, or bills of exchange, negotiated under it shall be indorsed upon it, so that it shall always show how much of the credit remains unexhausted. The names of the banks or persons in various parts of the world (correspondents of the issuing bank) who will cash or discount the drafts so drawn are printed on it. A large part of the foreign purchases made by merchants is effected through bills of exchange drawn under letters of credit. Such

letters are also much used by tourists to pay their traveling expenses.

2. Overdrafts, secured and unsecured, constitute an item in nearly all bank statements. Strictly speaking, they ought not to be there at all, but it sometimes happens that a depositor overdraws his balance by mistake. In such a case the bank's officers exercise their discretion, based upon their knowledge of the man's character and resources, in deciding whether they will pay the check which overdraws the balance or not. Until the overdraft is made good or is proved uncollectable it is properly reckoned as an unpaid debt among the bank's resources.

United States Bonds.

3. United States bonds to secure circulation will be more fully considered in the chapter on the national banking system. It may be remarked at present that this item of $50,000 among the resources is offset in large part by the outstanding circulating notes ($44,520) among the liabilities.

Other Interest-Bearing Securities.

4. It is desirable that a bank should have a portion of its interest-bearing assets so invested that it can be quickly turned into cash to meet a sudden emergency. This is especially needful in the case of a bank which holds large sums deposited by other banks, since a financial disturbance occurring in a distant quarter may bring sudden demands for cash from these depositing banks. Stock exchange securities are held by banks, partly because they can be sold at short notice to meet such emergencies, partly because opportunities occur to bankers for acquiring them at low prices, and sometimes because they have been compelled to take the securities for debts, which would otherwise have been lost.

5. Banking house, furniture, and fixtures are proper resources of a bank; for, if it does not own such property, it must pay rent to others for equivalent accommodation.

6. Commercial banks do not usually lend money on the security of real estate. Under our national banking law they are not allowed to do so, but they may take such property for unpaid loans previously made in good faith.

Real Estate.

7, 8. There is always a current account between banks for collections which they make for each other. They also lend and borrow among themselves and deposit money with each other for the sake of interest.

Due from Other Banks.

9. Checks and other cash items include checks and drafts on private banks in the city not members of the clearing house, and small advances, payable on demand, which do not go into the category of loans and discounts.

10. Exchanges for the clearing house are the checks, drafts, and other claims on other banks, members of the clearing house, which have not yet been collected.

11. Notes of other national banks are put in a place separate from the other cash, because under the national banking law they cannot be counted as a part of the legal reserve. For this reason the banks do not keep any large amount of bank notes on hand. They pay them out on checks, or send them to Washington for redemption in lawful money.

National Bank Notes.

12. These items constitute the bulk of the bank's cash reserve, amounting all together to $14,203,239.29. The legal reserve may consist of gold, gold certificates, legal-tender notes, silver, and silver certificates. The banks keep very few silver dollars and not more subsidiary silver than is needed for making change or meeting the demands of customers. The use of silver certificates, however, is increasing, since they are the only paper currency of denominations less than $10 that can be obtained in large amounts.

The Cash Reserve.

13. The national banking law requires that every bank which issues circulating notes shall keep a deposit of lawful money in the Treasury of the United States equal to 5 per cent of the amount thereof for the redemption of the same. This deposit may be counted as a part of the bank's legal reserve.

Bank Note Redemption Fund.

14. There is nothing to indicate what this sum may represent. Money is constantly passing between the banks and the Treasury. This item may represent subsidiary coins sent to the Treasury for redemption but not yet redeemed, or it may be money sent for the purchase of subsidiary coins not yet received.

15. The first item of liabilities is individual deposits, which have been sufficiently explained in the preceding chapter.

16, 17, 18. Under the national banking law country banks are allowed to keep three-fifths of their legal reserve in certain city banks approved by the comptroller of the currency. We may infer from the magnitude of the sum "due to other national banks" that this is one of the city banks so approved. Apart from this provision of law it is customary for country banks to keep considerable sums on deposit in city banks, for the convenience of making remittances for customers and also for the sake of the interest allowed by the city banks, which is usually at the rate of 2 per cent per annum. It has been a question much disputed in this country whether it is good banking practice to allow interest on such deposits payable on demand. It has been argued, in opposition to it, that it tends to the accumulation in the city banks of large sums which are liable to be called for suddenly whenever anything unusual happens in financial circles elsewhere. Such deposits are said to be in a high degree "explosive," tending to cause panics, or to aggravate them when they come. But

Country Bank Deposits.

it is argued, on the other hand, that somebody will always be found to pay interest on deposits. If the banks do not, the trust companies and private bankers, who keep their deposits in the city banks, will do so; and they will draw their own deposits to meet the calls of the country banks as suddenly and as freely as the country banks themselves would. The deposits will then be as "explosive" in the one case as in the other. Therefore the question to be considered is whether the city banks shall reap the profits which arise from the deposits of the country banks or allow other parties to do so. The same principles apply to the deposits of state banks and trust companies, etc.

Interest on Deposits.

19. Demand certificates of deposit are merely a change of form of ordinary deposits for making remittances, or for the use of travelers within the range of territory where the credit of the issuing bank is known. John Doe, in New York, for example, wishes to remit money to Richard Roe, in some town in which John Doe's bank has no correspondent or on which it does not draw. He cannot get a draft payable in that town, but a bank's certificate, payable to the order of Richard Roe, will answer the purpose equally well. Accordingly, John Doe draws a check against his own deposit and asks the bank to change the form of it into a certificate.

Certificates of Deposit.

20. Certified checks are virtually certificates of deposit in another form. They are the checks of depositors on which the paying teller of the bank has stamped the words: "Certified by the —— Bank" and placed his initials or some device recognizable by the other banks. A check so certified becomes the obligation of the bank in the same sense as a certificate of deposit. The amount is immediately charged against the account of the drawer.

Certified Checks.

21. The cashier of a bank draws checks on the paying teller for the purchase of securities from bill brokers, stock brokers, and others. The sellers deposit these checks in their own banks, and they are settled at the clearing house like other checks.

Cashier's Checks.

22. The circulating notes of this bank are a very small part of its total liabilities. This subject will be more fully treated in the chapter on the national banking system.

23, 24. The capital of a bank is primarily a guarantee fund contributed by the shareholders to give it stability and to create confidence in its soundness. A bank might exist in fair weather for some considerable time without capital, and many attempts have been made by speculators to realize that ideal, but any bank so launched has generally succumbed to the first financial gale. The surplus is a portion of the bank's profits not divided among the shareholders but set aside as a permanent addition to the guarantee fund. Under the national banking law the accumulation of a surplus equal to 20 per cent of the capital of each bank is made compulsory. Before the declaration of a dividend one-tenth of the net profits must be deducted and set aside for that purpose until that percentage is reached. For all banking purposes the surplus becomes an integral part of the capital.

Capital and Surplus.

25, 26. A bank statement must always show the amount of the accrued profits not yet divided. Dividends are usually paid the same day that they are declared, but it sometimes happens that shares of stock have changed hands or have been involved in litigation, or that the owners have died since the last payment was made. In such cases the money remains in the bank awaiting the rightful claimants, and appears among the liabilities as "dividends unpaid."

Profits.

RECAPITULATION

A bank statement is an exhibit of the bank's resources and liabilities made by the officers to the shareholders, to the depositors, and to the public generally. The resources and the liabilities are placed in separate columns. The resources consist of all the money in the bank, all the things received in exchange for money, and all the claims it holds against others. The liabilities embrace all that it owes to depositors and other creditors, all the capital contributed by shareholders, and all earnings undivided or unpaid. Therefore the amounts of the two columns should be exactly equal. If the inventory of the resources and the value placed upon them by the officers are correct, the statement shows the exact financial condition of the bank.

The national banking law requires each bank to make at least five statements each year showing its condition at dates already past, which shall be designated by the comptroller of the currency. No bank can know beforehand what date will be chosen by him. Consequently no special preparations can be made. The statements must be written on blanks furnished by the comptroller, which go much more into details than those published in the newspapers. The fact that these statements must be made, and that they will be closely scrutinized by other bankers, as well as by experts in the comptroller's office, operates as a spur and incentive to correct methods and honest management on the part of each individual banker, but is not an absolute guarantee thereof.

CHAPTER III

THE CLEARING-HOUSE SYSTEM

THE functions of a bank as a machine for facilitating exchanges are shown on the most extensive scale in the operations of the clearing house. This is an association of banks whose primary object is to settle the claims which the members hold against each other. If there were only two banks in a particular place, there would be no need of a clearing house. Two clerks would meet at regular intervals, at the banking house of one or the other, and compare the claims that each held against the other. If Bank A held checks, drafts, etc., for $10,000 drawn on Bank B, while the latter held only $9000 drawn on the former, Bank B would pay $1000 to Bank A and the checks, drafts, etc., would be mutually surrendered. A clearing house merely enables any number of banks to settle their balances in about the same time that two banks could do so, the clearing house being, for this purpose, the only creditor and the only debtor of each bank.

The Essence of Clearing.

The clearing-house system was first introduced in New York in 1853. Prior to that time it had been customary for each bank to send a messenger to every other bank each day with a pass book and a package of claims. Thus, Bank A would sort out all the checks and other claims it held against Bank B and, writing the amount in the book on the debit side of the page assigned to that bank, would send the book and package

The Old System.

to the latter. Bank B would acknowledge receipt of the checks and write on the credit side of the page the amount of its claims on Bank A, delivering by its own messenger the corresponding checks, etc., drawn on Bank A and having the proper acknowledgment made on its own pass book. As there were thirty-eight banks in New York at that time, there were seventy-six bank messengers continually traversing the streets, getting in each other's way and in the way of the bank's customers, and liable to assault or accident. The balances were shown each day by the footings of the pass books but, on account of the labor of carrying and counting gold coin, which was the only money receivable between banks, the settlements were made only once a week, and then by actual delivery of the coin, which was also carried in bags through the streets.

New York Clearing House.

Now there are forty-nine members of the New York Clearing House, including the assistant treasurer of the United States, the former number (61) having been reduced in recent years by consolidations. There are also seventy-nine banks and trust companies, not members of the clearing house, that clear through other banks.[1] The Union Trust Company, for example, makes an arrangement with the Bank of Commerce, by which all checks drawn on the former may be presented at the clearing house to the settling clerk of the latter and be treated by the latter exactly like checks drawn on itself. In this case the Bank of Commerce is responsible to its fellow-members of the clearing house for checks drawn on the Union Trust Company in the same way as for its own checks. Accordingly, it may happen that any bank may go to the clearing house with checks and drafts drawn on one hundred and twenty-seven different institutions.

[1] On May 9, 1911, trust companies were admitted to the clearing house as members.

In order to expedite the work, it must separate these checks into not more than forty-nine packages, one for each member of the clearing house upon which it holds any, and prepare a schedule showing the total amount of its claim on each bank. It must also have a debit ticket to be delivered to each — showing, for example, that Bank A has a total claim on Bank B for so much money. It must also come to the clearing house with a statement showing the aggregate of all its claims on all the banks. This, which is its claim against the clearing house for that day, is handed to the manager of the clearing house or to the proof clerk immediately upon entering. All these things must be done before the operation of clearing begins.

Preparations for Clearing.

Each bank sends to the clearing house a delivery clerk and a settling clerk. The settling clerks occupy seats in three parallel rows running lengthwise of the clearing room, each one having a sufficient amount of desk room for his work. The delivery clerks, with their packages of checks in separate envelopes, stand in an open space in front of the settling clerks.

All are expected to be in their places about ten minutes before 10 o'clock in the morning. At two minutes before 10 the manager of the clearing house strikes a bell; and, if any clerk is not in his place at that time, he is fined $2. The next movement is made with the precision, and with something of the appearance, of a military drill. At exactly 10 o'clock the bell is sounded a second time. Each delivery clerk then hands to the settling clerk in front of him the package of checks, etc., drawn upon the latter's bank, and at the same time drops the debit ticket, which shows the aggregate amount of such claims, into an aperture in the settling clerk's desk. The delivery clerk then takes one step forward and repeats the

The Operation.

operation with the next settling clerk, and so continues until he has handed out all his packages and tickets. Usually this part of the operation is completed in ten minutes. Meanwhile the proof clerk, who occupies a desk near the manager, has entered the claims of each bank under the head "Banks Cr." on a schedule like that shown on page 220.

Inasmuch as the amount of each bank's claim against the clearing house (entered under the head "Banks Cr.") is the sum of all the tickets which its delivery clerk has pushed into the letter boxes of the other banks, it follows that all the tickets of all the banks should equal all the entries under that head. The next step in the operation is for each settling clerk to arrange the amounts of all his debit tickets in a column, add it up, and send the amount to the proof clerk, who transcribes and arranges it under the head "Banks Dr.," so that the debit of Bank A shall be on the same line with its credit. Then the difference between the two will show how much the bank owes the clearing house or how much the clearing house owes the bank. The time occupied by the settling clerks in arranging their tickets and adding up the columns is about half an hour. As fast as these footings are completed, they are sent to the proof clerk, who puts them in the debit column opposite the credits of the banks respectively. When all are completed, if no error has been made, the footings of the credit and debit columns must be exactly equal, and the footings of the columns, which show the differences, must be exactly equal. Then these differences are read off slowly and distinctly by the manager, so that each settling clerk can write down the sum that his bank has to pay or to receive.

The Result.

As time is money at the clearing house, somebody is fined for every error, for every delay in making footings, for disobeying the orders of the manager or for any disorderly

NEW YORK CLEARING-HOUSE PROOF, TUESDAY, SEPTEMBER 10, 1901

		Due Clearing House	Banks Dr.	Banks Cr.	Due Banks
1.	Bank of New York, N. B. A.	$1,070,186.19	$20,604,888.59	$19,534,702.40	
2.	Bank of Manhattan Company	1,193,824.94	28,798,389.13	27,604,564.19	
3.	Merchants' National Bank	171,612.05	4,532,796.26	4,361,184.21	
4.	Mechanics' National Bank		4,752,638.33	5,040,967.25	$288,328.92
6.	Bank of America		14,465,273.53	15,175,830.35	710,556.82
7.	Phenix National Bank		4,081,891.47	4,371,918.31	290,026.84
8.	National City Bank		30,355,620.78	32,338,296.17	1,982,675.39
12.	Chemical National Bank	556,461.79	3,848,121.98	3,291,660.19	
13.	Merchants' Exchange National Bank	410,561.22	1,073,088.39	662,527.17	
14.	Gallatin National Bank	209,162.01	10,706,161.36	10,496,999.35	
15.	National Butchers and Drovers' Bank		72,884.28	81,483.61	8,599.33
16.	Mechanics and Traders' Bank		217,552.97	297,386.85	79,833.88
17.	Greenwich Bank	132.86	36,155.28	36,022.42	
18.	Leather Manufacturers' National Bank	88,045.57	946,311.38	858,265.81	
20.	Bank of the State of New York		18,906,717.17	19,215,686.43	308,969.26
21.	American Exchange National Bank	2,015,946.88	9,729,057.52	7,713,110.64	
23.	National Bank of Commerce		36,503,631.80	36,745,114.74	241,482.94
25.	National Broadway Bank		334,919.43	678,286.31	343,366.88
27.	Mercantile National Bank		3,347,221.02	3,594,684.37	247,463.35
28.	Pacific Bank		154,098.96	219,014.88	64,915.92
30.	Chatham National Bank	205,922.97	668,290.13	462,367.16	
31.	People's Bank	88,552.31	252,604.92	164,052.61	
32.	National Bank of North America		2,897,386.68	3,387,237.74	489,851.06
33.	Hanover National Bank	463,720.05	21,727,784.25	21,264,064.20	
34.	Irving National Bank		628,613.08	634,105.89	5,492.81
36.	National Citizens' Bank		361,452.03	513,205.43	151,753.40
40.	Nassau Bank	107,253.55	347,838.79	240,585.24	
42.	Market and Fulton National Bank	132,030.84	825,995.23	693,964.39	
44.	National Shoe and Leather Bank		471,768.96	602,038.18	130,269.22

45.	Corn Exchange Bank		11,282,144.86	11,445,598.04	163,453.18
49.	Oriental Bank	11,023.95	131,204.42	120,180.47	
53.	Importers and Traders' National Bank	760,832.82	3,439,567.36	2,678,734.54	
54.	National Park Bank	790,890.99	8,184,656.07	7,393,765.08	
59.	East River National Bank		84,880.63	86,622.45	1,741.82
61.	Fourth National Bank		14,034,917.68	15,980,418.87	1,945,501.19
62.	Central National Bank		1,617,228.68	2,089,132.93	471,904.25
63.	Second National Bank	205,008.67	513,103.37	308,094.70	
64.	Ninth National Bank	66,148.03	284,704.61	218,556.58	
65.	First National Bank	2,225,477.48	12,826,083.32	10,600,605.84	
67.	N. Y. National Exchange Bank		320,417.32	354,035.38	33,618.06
70.	Bowery Bank	26,510.88	219,895.63	193,384.75	
71.	N. Y. County National Bank	79,573.81	293,469.33	213,895.52	
72.	German American Bank		2,943,358.91	3,064,680.56	121,321.65
74.	Chase National Bank		5,197,785.92	6,061,103.91	863,317.99
75.	Assistant Treasurer U. S. at New York	1,232,963.19	1,974,775.89	741,812.70	
76.	Fifth Avenue Bank		423,175.72	645,626.13	222,450.41
77.	German Exchange Bank	5,487.17	260,051.38	254,564.21	
78.	Germania Bank	5,606.73	170,217.31	164,610.58	
80.	Lincoln National Bank		363,027.50	575,961.68	212,934.18
81.	Garfield National Bank	116,524.20	344,902.61	228,378.41	
82.	Fifth National Bank		93,113.96	127,850.08	34,736.12
83.	Bank of the Metropolis	9,424.76	249,640.32	240,215.56	
84.	West Side Bank	28,723.99	207,110.21	178,386.22	
85.	Seaboard National Bank		5,360,623.20	6,683,985.83	1,323,362.63
87.	Western National Bank		14,093,321.58	16,420,073.94	2,326,752.36
88.	First National Bank of Brooklyn	202,664.48	546,166.66	343,502.18	
91.	Liberty National Bank	43,569.03	433,351.87	389,782.84	
92.	N. Y. Produce Exchange Bank	281,739.71	755,854.45	474,114.74	
93.	New Amsterdam National Bank	259,968.30	929,865.99	669,897.69	
94.	Astor National Bank		115,247.74	123,594.38	8,346.64
95.	Hide and Leather National Bank	7,475.08	247,458.23	239,983.15	
		$13,073,026.50	$309,590,476.43	$309,590,476.43	$13,073,026.50

conduct. Forty-five minutes from 10 o'clock are allowed for completing the proof. For all errors remaining undiscovered at 11.15 the fines are doubled, and at twelve o'clock quadrupled. The highest fine for an error discovered before 11.15 is $3.

The table on the preceding pages is an exact copy of a proof sheet of the New York clearing house. It is obvious that it makes little difference, as regards the time and labor required to effect the clearings, whether the amount cleared is large or small. The clearing house is thus seen to be one of the great labor-saving machines of the modern world.

Present System of Payment.

Payments of clearing-house balances are made with gold coin, gold certificates, or legal-tender notes. Gold certificates, when not otherwise defined, are those issued by the United States Treasury; but some clearing houses which have vaults receive gold deposited by their own members and issue certificates which are available in making payments at the clearing house or between members, but cannot be transferred to non-members. Four-fifths of the payments at the New York clearing house are made with clearing-house gold certificates. The debtor banks must pay what they owe to the clearing house before 1.30 P.M., after which the clearing house pays the same money to the creditor banks. The clearing house is not responsible for the goodness of the checks, drafts, etc., which pass through it, but each bank is responsible to its fellow-members.

Magnitude of Clearings.

The clearings of the New York clearing house now average $254,000,000 per day and the balances, paid in about 1.30 P.M., as above described, average $11,600,000 per day, or a little less than 5 per cent of the clearings. It follows that about 95 per cent of these transactions offset each other. The New York clearings are, in point of magnitude, about two-thirds of

all the clearings in the United States, since New York is the place where other American cities most commonly settle their balances with each other.

The members of the clearing house determine what kind of claims shall be admitted to the clearings. Usually these are checks, drafts, and certificates of deposit, which are payable at sight or have already matured. Yet the practice is not uniform. Some clearing houses admit also the promissory notes and acceptances of private individuals which are drawn "payable at the —— Bank" and have matured. Others admit checks and drafts drawn on out-of-town banks which are correspondents of members of the clearing house. In some clearing houses payment of balances may be made by drafts drawn on other designated cities, or partly in cash and partly in such drafts. In Boston the practice exists of borrowing and lending balances among the members, on the floor of the clearing house, immediately after the day's balances are ascertained, and 60 per cent of the balances are usually disposed of in this way. Thus, suppose that a certain bank has a credit balance of $100,000 at the clearing house for which it has no immediate use. In order to save interest on this sum even for a single day, it lends its balance to a debtor bank "on call" — that is, repayable at demand. The creditor bank, in that case, gives an order in writing to the manager of the clearing house to transfer so much of its balance to the borrowing bank. This practice is so common in Boston that the clearing-house rate of interest is quoted regularly in the newspapers.

Other Varieties of Clearing.

The clearing-house association is well fitted for the performance of other duties than those of ascertaining and settling balances among the members. It is especially qualified for the task of checking financial panics. It sometimes happens that the demands of depositors for

currency are so great that the cash reserves of the weaker banks are at the point of exhaustion, rendering them liable to suspend payments. As the suspension of one bank at such a time may lead to excessive demands upon other banks, causing them to suspend also, it is necessary to grapple with the crisis before it becomes unmanageable. The banks therefore unite, through the clearing house, in the issue of "clearing-house loan certificates," in order to avert general disaster. There have been six crises in which the New York banks have adopted this method—and in the later cases with very complete success. The last one was in 1907, and a description of the process in this case will make clear the principles involved.

Clearing-House Loan Certificates.

The panic began with the suspension of the Knickerbocker Trust Company, October 22. The immediate consequence was the rapid withdrawal of deposits from the banks. Obviously, if all the deposits of a bank are demanded in this form at once, they cannot be paid out of a reserve which is usually only one-fourth of that sum. But some banks have larger reserves than others. Some are habitually more cautious than others. Some have larger capital and surplus, in proportion to their liabilities. Some have a more steady-going class of depositors, less likely to be affected by panic, than others. Such banks are able to help their weaker neighbors. By combining or "pooling" the reserves of all the banks, the weaker ones, or those most exposed to danger, may be saved, and thus the panic may be restrained or wholly averted. It is necessary, however, that the stronger banks be secured for the advances which they make, and the method successfully adopted in 1907 for aiding the weaker banks, without injuring the stronger ones, was the issue of clearing-house certificates.

"Pooling" the Reserves.

On the 26th of October, 1907, the Clearing-House Association resolved that any member might present to the loan committee its bills receivable or other securities, together with its own obligation, and receive, in exchange for such securities as were approved by the committee, "certificates" for 75 per cent of the par value of the same — these certificates to be accepted in lieu of cash in the payment of balances at the clearing house. The certificates drew interest at 6 per cent, payable to the holder, and were in the following form:

Form of Certificates.

No. —.

LOAN COMMITTEE OF THE NEW YORK CLEARING-HOUSE ASSOCIATION.

This certifies that the [name of bank] has deposited with this committee securities in accordance with the proceedings of a meeting of the Association held October 26, 1907, upon which this certificate is issued. This certificate will be received in payment of balances for the sum of *Five Thousand Dollars* from any member of the Clearing-House Association.

Five Thousand Dollars.

On the surrender of this certificate by the .....
depositing bank above named the committee .....
will endorse the amount as a payment on the .....
obligations of said bank held by them and .....
surrender a proportionate share of the collat- .....
eral securities held thereunder. .....

$5,000 Committee.

The certificates could not be used for any other purpose; and, as they drew the highest legal rate of interest from the time they were used, there was a pressure upon the banks not to take out more than they really needed. On the proof sheet shown above, the creditor banks were entitled to receive $13,073,026.50, which might be paid to them

(except fractional sums) in the obligations of the debtor banks, secured by these loan certificates. Thus the reserves of all the banks were made a common fund. The total reserve was not made any larger by this means, but all the reserves of all the banks were made available for those banks which were in temporary straits; and the aggregate demand for currency was lessened, because the union of the banks had a powerful influence on the public imagination. It did not lessen any real want of currency, but it quieted people's fears and checked their imaginary wants.

Effect on the Public Mind.

Suppose that a "run on the banks" takes place in a town which has only two such institutions — Bank A with a large cash reserve, and Bank B with a small one. Bank A, instead of demanding payment of the checks on Bank B, which it receives in the course of business, may accept the obligations of the latter, secured by its assets, and leave it free to use all its cash in meeting demands made directly upon it. By this arrangement Bank A practically lends Bank B cash for paying depositors as long as the reserves of the two hold out. If the run should continue, however, both banks, although essentially sound, would be forced into liquidation, unless their creditors should be willing to accept certified checks which could not be immediately paid. Any creditor whose demand was not paid could force a liquidation.[1]

The Case of a Small Town.

This represents on a narrow scale what takes place on a wide scale in a city with a large clearing-house association

[1] In the panic of 1893 there were three banks in the town of Albany, Ga., which weathered the storm by means of clearing-house loan certificates. In Vicksburg, Miss., five banks joined together in an agreement that they would not pay more than $50 per day in cash to any one depositor, and did so with impunity.

issuing loan certificates in a panic. The combined reserves of sixty-two banks are exhaustible in the same way as those of two banks or of one bank, but a large group of banks united together inspires confidence. People believe that it cannot fail, and because they so believe, it does not fail. When the combined reserves have been lowered to the danger point, the banks, instead of paying cash on checks presented to them, may stamp them "good through the clearing house"; and in nine cases out of ten the holders of the checks will accept them in this form and pay them to their creditors, who will deposit them in their own banks. The checks thus certified pass through the clearing house, where, as we have seen, 95 per cent of them offset each other. Every bank is required by law to pay every check on demand in legal-tender money. Yet, if the holder of the check accepts the stamp, "good through the clearing house," in lieu of cash, the law is satisfied. If he insists upon payment at all hazards, the bank must pay or close its doors, and in every such case it will try to pay. It keeps back some of its cash for such emergencies and to meet the needs of manufacturers for the payment of wages, or to answer demands where special hardship would arise from the want of currency. At such times the influence of public opinion is all-powerful and does not allow men to exercise their full rights. The fact is recognized that the banks cannot pay all their deposits at once and that, when a crisis comes, the banks can best judge what discrimination should be made.

That of a Large City.

The whole amount of loan certificates issued by the New York Clearing House in 1907 was $101,060,000, of which $88,420,000 were outstanding at one time. This did not prevent the partial suspension of cash payments. There came a time when most of the banks made some difficulty

about the payment of checks over the counter, although the clearing-house operations continued without interruption. Then the phenomenon of a "premium on currency" was witnessed in Wall Street. Certain persons who had currency in their possession were glad to sell it at a profit, while others who needed it, but who preferred not to add to the troubles of the banks by demanding it from them, were willing to give more than equal amounts in the form of certified checks for it. In this way a brisk business sprang up and the premium of currency over certified bank checks rose as high as 4 per cent.

Suspension not always prevented.

There are other features of the panic, however, which should not be overlooked.

In order to prevent people from drawing their own money out of banks, and at the same time to prevent the banks from incurring any penalties for refusing payment, the Governor of Oregon, in the autumn of 1907, declared legal holidays continuously from October 28 to December 14, seven weeks; that is, he legalized bank suspension for that period. The Governor of California declared such holidays from October 31 to December 21, eight weeks, suspending the whole judicial system of the state, both civil and criminal. In Indiana the Attorney-General declared that no state law was violated by banks or trust companies in limiting payments on deposits, if part payment was offered in each case. The Auditor of the same state assured all the banks and trust companies in writing that if they were solvent they need not make full payment on checks drawn by their depositors, and that each bank might decide for itself whether it was solvent or not. Similar action was taken by the public authorities in several other states, but generally the banks did not wait

The Device of Legal Holidays.

Other Plans to legalize Bank Suspension.

for such authorization. Each one immediately became a law unto itself.

In two thirds of the cities of the United States, of more than 25,000 inhabitants each, restrictions were arbitrarily imposed upon depositors, limiting them to various sums to be drawn, such as $10 to $50 per day, or per week, or per customer, but in most cases the amount to be paid was discretionary with each banker; that is, the banker could pay some customers in full and refuse others, or cut them down to any percentage he pleased. Only fifty-three cities in the United States of the size mentioned maintained cash payments without any restrictions. The total amount of clearing-house certificates reported in the cities of this size was $330,066,223.

Shinplaster Currency.

In most cities and towns substitutes for money were put in circulation. All were illegal. Some were engraved to resemble bank notes or government notes, and these were doubly illegal; some were as small as twenty-five cents, and these were trebly illegal; some were in the form of postnotes, which are prohibited by law. State banks issued circulation as freely as national banks. Upwards of twenty-three millions of this kind of circulation were issued. The inscriptions were various. Some were made payable to order, some to bearer, and some "To the order of bearer." They were issued not only by banks, but by any kind of corporation. The Standard Oil Company issued them in small denominations in New York City, drawn on the National City Bank, "payable to the order of bearer." In Pittsburg a large manufacturing corporation drew checks for $1 for wages payable to bearer, with these words stamped on the back in four different languages: "This check may be deposited, but will not be paid in cash by the bank." Many of the poor laborers from eastern Europe who received these things tore them up after reading them and

threw away the pieces. The only idea conveyed to their minds by the inscription was that the checks would not be paid.

A Premium for Cash.

In New York City currency was sold at 4 per cent premium over bank checks. Any man having one hundred dollars cash in his pocket could sell it for a check for one hundred and four dollars, stamped "good through the clearing house." These conditions lasted twenty-two weeks with varying intensity. In 1893 only eight cities resorted to clearing-house certificates for settling bank balances. In 1907 there were forty-two such. In the latter year the total amount of certificates issued in New York was two and one-half times greater than in any previous panic, in Pittsburg seven times, in New Orleans five times, in Detroit four times, in Baltimore two times, and in the whole country three and one-half times greater. In 1893 the duration of the suspension was nineteen weeks; in 1907 twenty-two weeks.[1]

These frequently recurring episodes tend to deaden the sense of commercial honor. Every such suspension is a license to every financial institution to scale its debts or to postpone the payment of them. When banks thus repudiate their obligations their depositors can hardly do otherwise, and thus a bad education is disseminated in the community. People come to think that bank suspensions are among the dispensations of Providence instead of being the signs of a defective banking system.[2]

RECAPITULATION

Clearing is the settlement of mutual claims by the payment of differences. In bank clearings the clearing house is the only creditor and the only debtor of each bank. It

[1] See article entitled "Substitutes for Cash in the Panic of 1907," by A. P. Andrew, in the *Quarterly Journal of Economics*, August, 1908.

[2] This subject will be further treated in Chapters XVIII and XX.

ascertains the amount of each bank's balance, receives the money due from the debtor banks, and distributes it to the creditor banks. The clearing house is a labor-saving machine; and it makes little difference, as regards the time and labor involved, whether the number of banks and the amount of claims adjusted be large or small.

Clearing is susceptible of application to other kinds of business than that of banks. There is a railway clearing house in London, for the settlement of balances of railway earnings. There is a stock exchange clearing house in London, and one in New York, for settling differences between stockbrokers. There was a gold exchange bank in New York during the suspension of specie payments, which operated as a clearing house for dealers in that metal.

A clearing-house association, as an organization of banks, is well fitted for other tasks besides settling balances with each other. It has been especially useful in calming the public mind in times of financial panic. This it has accomplished by combining the cash reserves of all the banks, putting them under the control of a committee, and issuing loan certificates for the payment of balances at the clearing house. By this means the banks lend to each other their cash reserves, according to the discretion of the committee. The repayment of the loans is secured by the bills receivable, or other assets, of the borrowing banks.

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CHAPTER IV

COLONIAL BANKING

A PUBLIC bank in the American colonies, as we have seen, was an emission of circulating notes by a provincial government, with a promise of redemption of the same from the proceeds of taxation at a fixed time. A private bank was an emission of notes by private persons, to supply a supposed deficiency of the medium of exchange. In some cases there was a specific promise of redemption of such notes. In others there was merely an agreement among the subscribers to accept them in trade. According to the latter plan it was not necessary that a bank should have any capital, but merely that it should have the means of putting its notes in circulation. Consequently the subscribers to the undertaking did not agree to pay money into the bank, but to take out and keep out a quantity of the note issues proportioned to their subscriptions, and to accept the same in trade as the equivalent of money. As security for the fulfillment of this promise, and for the ultimate redemption of the notes in money or goods, they gave mortgages of land to the association of which they were members. The association was both a lending and a trading company. It bought goods with its notes, or loaned the notes at interest on the security of land or personal property.

Colonial Ideas of Banking.

The current ideas of banking were derived from England, and more remotely from the continent of Europe. The Bank of Amsterdam was established by the city government

of that place in 1609, for the purpose of maintaining the true standard of value in commercial transactions. The coins then in circulation were not of uniform goodness. Some were worn by long use, others were mutilated, many were produced by private mints. They were of almost countless variety and were, on the average, about 9 per cent below their nominal value. The Bank of Amsterdam served both as an assay office and as a place of deposit. All sorts of coins were received from depositors and their weight and fineness determined, and the depositors were allowed to draw out for their own use, or to transfer to others, the true value in standard money, or in "bank money," as it was commonly called. All bills of exchange payable in Amsterdam were required by law to be paid in bank money. Transfers of such money were at first made by the payer to the payee personally in the bank, but this method was afterward superseded by orders in writing; and here, perhaps, we find the origin of the bank check.

The Bank of Amsterdam.

The lesson which had been learned in England from the continental banks in the first half of the seventeenth century was that if the degraded coin then in circulation should be deposited in a bank and an equivalent credit in terms of standard coin be given depositors, such credits could be made use of in the adjustment of debts by transfers of account at the bank. The idea of making a bank thus act as a clearing house for the nation, through the deposit in its vaults of all the current coin, and its conversion into bank credits, soon led to propositions to comprehend goods and merchandise with coin in the establishment of bank credits. This was naturally followed by the argument that land, being stable and unperishable, was even better for the purpose than coin or goods.[1]

[1] *Currency and Banking in the Province of Massachusetts Bay*, by Andrew McFarland Davis, Part II, "Banking" (1901).

The assumption that giving security for the *ultimate* payment of a paper currency is the same thing as providing for its redemption at *any* time, or that it will answer the same purpose, is a pernicious fallacy. It confounds the promise to pay money with money itself. The promise to pay is of full face value only where there is certainty of its fulfillment at the demand of the holder. Security, on the other hand, implies payment at some future indefinite time; and, where land is the security, the time is usually remote. A paper currency must be promptly redeemable in coin. No kind of security, not even that of government bonds, is a good substitute for such redemption. Yet the idea of "basing" currency on various kinds of property, and especially on land, has had many advocates; and many experiments — invariably ending in disaster — have been made with currency of this kind.

The Fallacy of Land Banking.

This idea found lodgment on our shores in the latter part of the seventeenth century. In September, 1681, there was established in the colony of Massachusetts Bay a company called "The Fund at Boston in New England," whose object was to facilitate the transfer of property and credits among the members by book entries at the head office. The basis of the Fund consisted of mortgages conveying to the trustees certain real estate to be held by them for the purposes designated in the articles of association. To each mortgageor was given a corresponding credit which he could transfer to any other member in the form of a "change bill" for any debt, purchase, or obligation. Our knowledge of this institution is very slender, being limited to one mutilated pamphlet and a few mortgages in the Suffolk Registry of Deeds for the years 1681 and 1682.[1]

"The Fund at Boston in New England."

[1] See essay on "The Fund at Boston in New England" by Andrew McFarland Davis, in Proceedings of the American Antiquarian Society, April 29, 1903.

This was followed in 1714 by a more elaborate scheme of private banking entitled "A Projection for erecting a Bank of Credit in Boston, New England, founded on Land Security." The preamble recited that there was a sensible decay of trade for want of a medium of exchange. To supply this deficiency certain parties proposed to subscribe £300,000, every subscriber agreeing to "settle and make over real estate to the value of his respective subscription, to the trustees of the partnership or bank, to be and remain as a fund or security for such bills as shall be emitted therefrom." Each subscriber was pledged to give the same credit to the bills as to those of the province, and to accept them in all payments, "upon forfeiture of £50 for each refusal until the refuser has forfeited his whole security and profits." Loans of the bills might be made on "ratable estates," to the amount of two-thirds of their value; on "iron or other unperishable commodities, as a pledge, for one-half or two-thirds according to the market." Each subscriber was obligated to take out, and keep out for two years, notes of the bank equal to at least one-fourth part of the amount of his subscription; but he could transfer this obligation, or privilege, to any other person on the books of the bank. All loans were to bear 5 per cent interest. The form of the notes contained no promise to pay, but merely the pledge of the subscribers to "accept the same in lieu of —— shillings in all payments" and the pledge of the bank to accept them "for the redemption of any pawn or mortgage in the said bank."

The "Projection" of 1714.

Crude Conceptions.

The "Projection" led to a controversy which, the historian Hutchinson says, "had an universal spread and divided towns, parishes and particular families." Paul Dudley, the Attorney-General, attacked it on legal grounds: No process

was indicated by which any holder could compel any subscriber to receive the notes as the equivalent of silver money in goods, nor was there any provision for fixing the price of the goods. The General Court disapproved of the scheme and, in order to create a division in the ranks of its supporters, passed a new loan act for £50,000 of colonial bills of credit. "This," says Hutchinson, "lessened the number of the party for the private bank but it increased the zeal and raised a strong resentment in those which remained."

The New London Bank of 1732.

Following this attempt, and evidently patterned on it, was a company formed in Connecticut in 1732 under the name of the New London Society United for Trade and Commerce. A petition for a charter, addressed to the colonial assembly in 1729 by Solomon Coit in behalf of the company, asked among other things that the company be allowed to "emit bills for currency upon our own credit as we may see occasion at any time, for promoting or maintaining our trade" and that the penalties for counterfeiting the bills should be the same as for counterfeiting those of the province.[1] The petition was refused, for the reason, evidently, that the assembly was not willing to grant to a private company the power to issue bills of credit as currency. Three years later a charter was granted to the New London company without the power to issue bills, but the company immediately passed a vote to issue £30,000 of bills and began to put them in circulation by buying goods from persons who were willing to take them. The bills recited on their face that they should be "equal in value to silver at sixteen shillings per ounce, or to bills of publick credit of this or the neighboring governments." There was no promise that money or anything should be paid for them, but merely that they should be accepted by the treasurer of the society "and in all

[1] Davis, *Banking*, p. 105.

payments in said society from time to time." The society had no capital, but the members had executed mortgages of land which were supposed to secure the holders of the notes.

The bills of the New London company were eagerly accepted in trade; but, as soon as the fact of their issue came to the knowledge of Governor Talcott, he took steps to suppress them. The colonial assembly was called together to consider the subject. It declared that it was not legal for private persons to emit bills of credit to circulate as money without authority from the government, and it repealed the charter of the New London company for violation of its provisions — particularly because it had no capital paid in, as the charter contemplated, but only mortgages as a basis of its trading operations. The company was accordingly dissolved, and the legislature made an issue of colonial bills of credit with which to redeem the company's bills, taking the mortgages in the hands of the company's treasurer to reimburse the government.

The Company suppressed.

Rhode Island in 1731 struck terror into the business communities of Massachusetts and Connecticut by a "new bank," with an issue of £100,000 in bills of credit as loans to individuals. An attempt was made in Massachusetts to forestall this issue by an agreement of the leading citizens not to accept them in trade. In order, at the same time, to preoccupy the field of circulation, a number of Boston merchants of high standing formed a partnership and issued £110,000 of notes intended for general circulation. They were issued as loans at interest, repayable in notes of the same kind, or in coined silver of specified weight and fineness, at different periods during the next ten years. The details of the issue are interesting, but the only fact of importance now is that this was an attempt to drive out a bad currency

Private Note Issues in 1731.

by issuing a better one to take its place. The result was in strict accord with Gresham's Law. The Rhode Island bills came in, despite the efforts made to keep them out. They caused a further depreciation of the currency. The merchants' notes, which had a fixed value in silver and were supported by the credit of wealthy and well-known citizens, commanded a premium and were consequently hoarded.

This kind of banking found imitators in the Province of New Hampshire. In 1735 a number of merchants in Portsmouth formed a partnership and issued notes of various denominations, payable in ten years "in silver or gold at the then current price." The only important fact about this bank is that the assembly of Massachusetts passed an act to prohibit the circulation of these notes in the latter province, and that the Lords of Trade in London disallowed it, on the ground that, since nobody was obliged to take them, "it would be a great hardship to set a public mark of discredit upon the persons engaged in this undertaking." In other words, the Lords of Trade recognized the fact that the issue of notes by private persons to circulate as money was permissible, provided they were not made legal tender.

A New Hampshire Experiment.

The next attempt to establish a bank in Massachusetts, and the one most disastrous to the projectors, was made in 1740 under the name of the "Land Bank or Manufactory Scheme."[1] It was an outgrowth of the ideas which gave birth to the "projection" of 1714 and to the New London Bank of 1732. The prospectus was published as a broadside on the 10th of

The Land Bank of 1740.

[1] See "A letter to a merchant in London concerning a late combination in the Province of Massachusetts Bay in New England to Impose or Force a Private Currency called Land Bank Money; printed for the publick Good, 1741." This pamphlet is anonymous, but Mr. A. McFarland Davis says that it was written by Dr. William Douglass. The style certainly resembles that of Douglass.

March, 1739–40. It proposed to found a bank with a capital stock of "£150,000 lawful money" but did not provide for paying in any money, except 4*s.* on each £1000, to meet the expenses of organization. Each subscriber was to "make over an estate in lands" to the satisfaction of the directors and pay 3 per cent interest for the same, either in the bills of the company or in various manufactured articles, the produce of the provinces. The list of things so receivable included hemp, flax, cordage, iron, wool, beeswax, tallow, cord wood, and a dozen others, at prices to be fixed by the directors. Five per cent of the principal of the subscription was to be paid each year in the same articles or in said bills. The form of the bills was appended to the prospectus, thus:

Twenty Shillings.

We promise for ourselves and partners to receive this twenty shilling bill of credit as so much lawful money in all payments, trade and business, and after ye expiration of twenty years to pay ye possessors ye value thereof in ye manufactures of this province.

The wording of the bills was subsequently changed to the following form:

We jointly and severally promise, for ourselves and partners, to take this bill as lawful money at six shillings eight pence per ounce in all payments, trade and business and for stock in our treasury at any time; and after twenty years to pay the same at that estimate on demand of Mr. Joseph Marion, or order, in the produce or manufactures enumerated in our scheme, for value received.

Although no method of issuing notes was described in the prospectus, it was understood that the capital stock of £150,000 was to consist of bits of paper of the foregoing tenor, to be divided among the subscribers in proportion to their subscriptions, and that they were to buy goods with

them, subject to the condition that they should accept them in trade, at the rate of 6*s.* 8*d.* per ounce of silver — a phrase which, in the absence of any fixed prices for the goods traded in, was quite meaningless. But even if this had been a solvent specie-paying bank, the net result would have been a donation of the face value of the notes by the public to the bankers, without any return whatever, since the notes were payable only at the end of twenty years, and the prevailing rate of interest was 5 per cent. At least one thousand men of Massachusetts saw this prospect of gain, for fully that number subscribed for shares in the "Land Bank or Manufactory Scheme." These men had large political influence. They soon acquired a majority in the House of Representatives, but Governor Belcher and the Council were bitterly opposed to the project. The governor issued a proclamation against it and cautioned all persons, especially all office holders, against receiving the bills of the Land Bank, saying that they tended to defraud people of their property.

Its Note Issue.

Opposition of Governor Belcher.

Notwithstanding this opposition, the Land Bank began to issue its bills in September, 1740. Their appearance in business circles caused much anxiety in Boston, whose merchants could not fail to see the mischievous and unsubstantial nature of the scheme. One hundred and fifty of them signed an agreement that they would not take the Land Bank bills on any terms or countenance their use in any way. The Land Bank now became the great issue of the day, overshadowing every other. Governor Belcher removed from office several persons who favored the bank after he had issued his proclamation against it. Many others tendered their resignations, among them Samuel Adams, Sr. The directors of the Land Bank sent a copy of their articles of association to the Council for

Political Consequences.

record. The Council ordered the secretary not to receive it and voted that the presentation of it was an indignity.

That the Land Bank was legal, in the absence of any prohibition by the General Court, does not admit of doubt. Governor Belcher, the Council, and the Boston merchants knew this. They knew also that they could not get the lower house to join with the Council in prohibiting it. So they turned to Parliament, and here they were more successful. On the 27th of March, 1741, the House of Commons passed an act extending the provisions of the so-called Bubble Act of 1720 to the American colonies. The latter act had been passed in order to prohibit the transaction of business by joint stock companies without special authority of statute, and it imposed severe penalties upon those who should do so. It was applicable only to the United Kingdom; yet Parliament now declared that it "did, does and shall extend to America," and in the preamble it referred expressly to the Land Bank as one of the offenders against it. This was *ex post facto* legislation, based upon historical untruth. Not only had the Lords of Trade, in the New Hampshire case cited above, refused to put the stamp of illegality upon a bank in the colonies, but the Attorney-General in 1735 had declared in an official communication that there was no objection in point of law to a land bank at that time projected "at Boston in the Massachusetts Bay."

Parliament takes Action.

Before the news of the act of Parliament reached Boston the bills of the Land Bank had been somewhat discredited by reason of the refusal of the principal merchants of Boston to touch them. Their action caused great exasperation in the rural districts, and a movement was started to use mob violence against them. Governor Belcher received information of the intended riot and sent the sheriff to arrest the leaders of it.

Mob Violence.

The Land Bank men, in order to get their notes in circulation, had bought any kind of goods for which the owners would accept the notes in payment, and at such prices as the individual traders could agree upon. There was nothing like a uniform price of goods so bought. Now the Bubble Act altered the terms of these private contracts by giving the holders of the notes an immediate right of action against every partner for their face value. Many of the shareholders were ruined. Some of them withdrew to the neighboring colonies where they could not be reached, leaving a heavier burden upon others. The affairs of the Land Bank occupied the attention of the General Court for a quarter of a century, and the litigation growing out of its affairs was protracted till 1767 or later.[1]

No step taken by the mother country in reference to the colonies was more maladroit than this. No other, not even the Stamp Act, caused greater bitterness. It was also quite unnecessary, for the Land Bank was doomed to an early death by its inherent vices. Its weakness had already been manifested in the early return of its bills to the company's treasurer and to individual members, to be exchanged for tangible property, lest they should fall in value. Just as it was beginning to totter by reason of its own feebleness the British government gave it an annihilating blow. All the educating and helpful influence that would have followed from a natural demise was lost, and in its place was planted an undying animosity toward the mother country for an act of glaring injustice. Massachusetts was nearly ripe for revolution in 1741.

[1] The history of the Land Bank of 1740, down to the smallest minutiæ, is given by Mr. A. McFarland Davis in the volume cited on page 233.

RECAPITULATION

The principles of banking are the outgrowth of experiment. They must be learned from the history of banking, and particularly from the laws that have been enacted from time to time. These laws are the crystallization of ideas dominant at given periods.

The earliest ideas of banking in the American colonies were drawn from the mother country, and, more remotely, from the continent of Europe. The commonest conception of a private bank in New England was that of a company or partnership formed to supply circulating notes as a medium of exchange, in addition to the bills of credit of the colonial governments. It was believed that, if such notes were bottomed on landed security, current redemption would not be necessary. In this view no capital was required for the starting of a bank, but merely confidence. Several attempts were made to establish banks and to supply a medium of exchange on this theory, but the experiments were always checked or suppressed by the colonial or the home government before the ultimate economic results had manifested themselves.

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CHAPTER V

EARLY AMERICAN BANKS

THE first bank in the United States was the Bank of North America, at Philadelphia. It was planned and put in operation in 1781 by Robert Morris, the Superintendent of Finance of the Revolution, in order to give financial support to Washington's army. It had been preceded by a so-called "Bank of Pennsylvania," which was a private subscription of money, not for the sake of profit, but to supply rations for the army when the Continental currency was becoming worthless.

Bank of North America.

Morris conceived that a bank with a paid-up capital, on a specie basis, and in high credit, "would have the interest of a stock two or three times larger than that which it really possessed." By this he meant that it could lend its credit, and receive interest therefor, to an amount two or three times larger than its cash on hand, — a sound conception. The project was approved by Congress, which granted a charter to the bank on May 26, 1781. The great difficulty was to secure the necessary subscription. The capital stock was fixed at $160,000, with power to increase it, but only $70,000 was subscribed in the first four months. Fortunately a French frigate arrived at Boston in September, bringing $462,862 in specie to the government. Morris brought it in wagons to Philadelphia and lodged it in the bank. He then increased the capital stock to $400,000 and made a subscription of $250,000 thereto for the government, paying in $200,000 of

Chartered by Congress in 1781.

the amount. This brought financial support to the bank from private sources and gave it immediate credit, through which it was enabled to make large advances to the government, besides doing a considerable business in the discount of commercial paper. Morris' anticipations were fully realized. The troops were regularly fed, clothed, and paid; industry revived; the bank's notes were redeemed in specie on demand; and it was found that there was no lack of a circulating medium. This magical transformation took place after the Continental currency had disappeared, and largely because of its disappearance.

Its Service in the Revolution.

Doubts existed whether Congress had the power, under the Articles of Confederation, to charter a bank. Consequently, the Bank of North America sought and obtained another one from the legislature of Pennsylvania. After the termination of the war the bank became very prosperous, paying dividends of 14 per cent per annum. These gains prompted the starting of another bank in Philadelphia; but the Bank of North America offered to enlarge its capital and take in the subscribers to the new bank, and the offer was accepted.

Rechartered by Pennsylvania.

Morris had remarked in 1784 that the bank had created a habit of punctuality in the payment of debts and that everybody felt the benefit of it, — meaning everybody who was in good credit. These, however, were far from being a majority of the people. Complaints were made to the legislature that the bank was guilty of favoritism, extortion and harshness to debtors, and that it tended to destroy that equality which ought to exist in a commercial country. A petition embodying these and other accusations was presented from citizens of Chester County, with a hint that bills of credit issued by the state would be more beneficial than bank notes. This meant that bills of credit would be

Attacks on the Bank after the War.

distributed according to population or political influence, whereas bank loans were at the service only of men who could repay them at maturity.

The legislature took the matter into consideration and appointed a committee "to inquire whether the bank established at Philadelphia was compatible with the public safety and that equality which ought ever to prevail between the individuals of a republic." This idea, that the business of banking savors of aristocracy and tends to the overthrow of free institutions, had a strong hold on the public mind in the early years of the republic[1] and has not yet wholly disappeared, although it has undergone some modifications.

The Charter repealed.

The legislature of Pennsylvania was so far convinced of the tendency of banks to produce inequality among citizens that it repealed the charter of the Bank of North America on September 3, 1785, within three years of the time when it had rendered inestimable services to the patriot cause. The bank protested that the charter was irrepealable and continued its business, but took steps to obtain a charter from Delaware, with the intention of transferring itself to Wilmington. Such a charter was granted early in 1786. Then Pennsylvania, fearing lest it should lose the bank, in 1787 granted it a new charter which was renewed from time to time and under which it continued till the national banking law was passed. It declined at first to enter the national system, because, under the rules adopted by Secretary Chase, it would have been obliged to change its name. But a dispensation was granted to it, on account of its illustrious origin, to come in without

[1] "Pope, of Kentucky, in the debate of 1811, said that the Virginians were known to be very poor financiers, 'for they were, a few years since, frightened at the very name of a bank. . . . It required all the eloquence of [Brent of Virginia] to persuade the Legislature that the little Bank of Alexandria would not sweep away their liberties.'" — SUMNER, *History of Banking in the United States*, p. 20.

such change. The Bank of North America is now one hundred and twenty-seven years old, and has passed its semi-annual dividend only five times. The benefit it has conferred upon the country, by setting an example of sound principles and practice in banking, is second only to its patriotic service in the Revolution; and for both we are indebted to Robert Morris, although he was never president or even a director of the bank.[1]

And reënacted.

Ordinarily it would not be good banking practice to advance large sums of money to the government or to have the government for a shareholder of the bank, but both of these features were necessities in the case of the Bank of North America. Within the limits thus imposed, the bank was conducted in a businesslike manner. The government paid interest and principal on its loans like a private borrower, and received dividends on its shares like a private stockholder. It ceased borrowing and sold its shares as soon as possible.

Next in point of time was the Bank of Massachusetts. Its charter, granted by the legislature on February 7, 1784, contained no restrictions or conditions except the right of the legislature to examine its affairs. No mention was made of circulating notes, since the right to issue them was thought to be embraced in the right to be a bank, though a subsequent law was passed by the same legislature to punish persons who should counterfeit the notes. The first restrictions on the bank were imposed by a law passed in 1792. These were: (1) that the bank should not issue notes smaller than $5.00; (2) that the outstanding notes and loans should not exceed

Bank of Massachusetts.

[1] *A History of the Bank of North America* down to 1882 has been written by Lawrence Lewis, Jr. An interesting account of its origin and early years is given in Sumner's *Financier and Finances of the American Revolution.*

double the amount of the capital stock actually paid in; (3) in case of violation of this law, the directors were made personally liable for the debts of the bank, but those who were absent or had dissented might exonerate themselves by giving notice forthwith to the governor of the state; (4) statements of the bank's affairs were to be given to the governor and council every six months, but no form of statement was prescribed; (5) the bank was prohibited from dealing in merchandise or in the shares of any bank.

First Legal Restrictions.

The third in point of time was the Bank of New York, founded — or, at all events, proposed — by Alexander Hamilton in 1784, as an alternative to a land bank favored by Chancellor Livingston. Under the Livingston plan one-third of the bank's capital was to be paid in cash and the remaining two-thirds was to consist of landed security in New York and New Jersey. In March, 1784, Hamilton wrote a letter to J. B. Church, counseling him against this project and proposing a "money bank" in place of it. He dissuaded several city merchants from taking an interest in the land bank, and they then asked him to draw up articles for a money bank, which he did. This was the Bank of New York. It began business without a charter on June 9 of the same year. As its application to the legislature for a charter was refused, it began business without one; but the only penalty for doing so was the condition that the liability of the shareholders for the debts of the bank was unlimited.

Bank of New York.

The bank, when organized, announced that the rate of interest on loans would be 6 per cent, that loans should run for thirty days only, that no note would be discounted to pay a former one, that payments to the bank must be made in its own notes or in specie, and that overdrafts would not be allowed. Gold coins, which at that time were

more or less clipped or abraded, were to be received by weight only. These regulations, especially the one requiring punctual payment of debts, made the bank very prosperous but very unpopular.

The directors were charged with working in the interest of British capitalists and traders and with refusing discounts a few days before the sailing of the European packet, that they, personally, might profit by the distress thus occasioned. The bank, it was contended, had destroyed private credit, as well as that confidence, forbearance and compassion formerly shown by creditors to their debtors. Such was the result of enforcing the payment of a note at maturity when lodged in the bank. And among the terrible consequences to follow, it was predicted that "if their number is not restricted, should banks be permitted in America, after the profits they yield are known, we may not alone have one in every state but also in every county of the different states."[1]

The Bank Unpopular.

In 1786 the state made an emission of bills of credit, with the result that the bank divided itself into two parts, a specie bank and a paper bank, keeping the accounts of the former in dollars and of the latter in pounds, making discounts in paper on Tuesdays and in specie on Thursdays, and issuing some of its circulating notes redeemable in paper of the state and others redeemable in specie.

An application was made for a charter in 1785 and another in 1789. Both were refused. A charter was finally granted to the bank in 1791. It provided (1) that the debts of the bank, "over and above the monies then actually deposited in the bank," should not exceed three times the amount of the capital actually paid in; (2) that it should not hold real estate, except such as might be requisite for the accommodation of its own business or such as it should have taken as security

Legal Restrictions.

[1] *History of the Bank of New York, 1784–1884*, by Henry W. Domett.

for debts previously contracted; (3) that it should not deal, or trade, in any kind of commodities, or in the stocks of the United States, or of any state, though it might, when necessary, sell any such stocks pledged to it by way of security.

In the first list of shareholders of this bank are the names of Alexander Hamilton, Aaron Burr, and Rufus King. One of the depositors was Talleyrand, some of whose checks are still preserved.

The earliest regulations of banking enacted by public authority in the United States were those enumerated above. The first regulation of Massachusetts had reference to the denominations of bank notes. The question whether a bank should be allowed to issue notes smaller than $5.00 or $10 was a matter of controversy in most of the states during the first half of the nineteenth century. Legislation on the subject was not uniform. It was contended, on the one hand, that it was desirable to have a large amount of specie in circulation, in order to give stability to the currency, and that the way to secure this was to banish small notes. It was also argued, on the other side, that the circulation of specie, beyond the amount required for small change, was an inconvenience and involved an appreciable loss by abrasion. Experience in the United States has now decided in favor of paper currency of denominations as small as $1.00.

Question of Small Notes.

The restriction of notes and loans to twice the capital stock actually paid in was intended to guard against undue expansion of both debts and credits. In the later legislation of Massachusetts, as will be seen, the restriction was changed so as to provide that neither the credits nor the debts of a bank (except for deposits) should exceed twice the

Restriction of Debts and Credits.

capital, the deposits not being reckoned as debts for this purpose. (This restriction, as regards loans, has been superseded in the national banking law by a requirement that a bank shall not make new loans when its cash reserve is below a certain percentage of its deposits.) In case of violation of the law, the directors were personally liable for the debts of the bank unless they took immediate steps to make their dissent known to the public authorities.

The reasons for requiring periodical bank statements have been considered in Chapter II, but the Massachusetts requirement was defective, since it gave opportunity to the bank's officers to make special preparations therefor. The prohibition against trading in merchandise was proper, since such trading would have made the banker a rival in business of the merchant and to that extent would have incapacitated him for discounting the merchant's paper. The two vocations should be coöperative, not competitive. It was inexpedient also for a bank to buy its own shares, since by so doing it impaired its capital. If Bank A, for example, with a paid capital of $100,000, buys in all its shares, it stands just where it was before any was paid. If Banks A and B buy each other's shares, the result is the same as though each one had bought its own shares. The community, in that case, has no more banking capital than if neither of them had ever existed.

Other Prohibitions.

As the debts of a bank consist, for the most part, of its deposits and its circulating notes, the first legal restriction on the powers of the Bank of New York was practically that its note issues should not exceed three times the amount of its paid-up capital. If there was to be any legal restriction on note issues, this provision was sufficiently liberal. At the time

New York Restrictions.

when the charter was granted, and while there was no restriction whatever on its note issues, its paid-up capital was $318,250 specie, and its outstanding notes of the two kinds only $360,000 specie value. The clause in reference to the holding of real estate was a sound restriction. Since a bank's liabilities are payable on demand, its investments should be in quick assets. Real estate is not included in that category. The prohibition against trading in commodities is a repetition of the law of Massachusetts, and the reasons for it are the same. It does not, however, follow that the banker should not buy or sell stocks of the state or of the United States. Those are often highly desirable forms of investment for some part of the funds of banks, by reason of the facility with which they can be turned into cash in emergencies.

RECAPITULATION

When the Federal Constitution was formed, there were three banks in the United States, which still exist, — the Bank of North America at Philadelphia, the Bank of Massachusetts, and the Bank of New York. All were issuing circulating notes, and continued to do so, without dispute or question, after the Constitution was adopted. It is plain, therefore, that the clause of the Constitution which prohibits the states from emitting bills of credit did not prohibit, or have any reference to, bank notes.

One of these banks existed several years before it received a charter from the legislature, and it exercised, without dispute or question, the functions of issue and deposit. It is evident, therefore, that the banking business was free in the United States until it was restrained by statute. Restrictions were enacted by the state legislatures from time to time, which reflect the state of public opinion at the several

times and places. The earliest regulations of law related to the denominations of bank notes, to the proportions which should exist between the capital on the one hand and the debts and credits of banks on the other, to the holding of real estate, and to the power of trading in goods and securities.

Authorities

Sumner's *Financier and Finances of the American Revolution.*
Lewis' *History of the Bank of North America.*
Domett's *History of the Bank of New York, 1784–1884.*

CHAPTER VI

FIRST BANK OF THE UNITED STATES

THE next event of importance in the history of banking in this country was the organization of the Bank of the United States in 1791. This institution was established on lines laid down by Alexander Hamilton, the first Secretary of the Treasury, in a report dated December 14, 1790, made in obedience to an order of the House of Representatives. This report embraced a statement of the principles which should, in his opinion, govern such an institution and of the reasons why it might be useful to the government in emergencies and to the business community at all times. Hamilton took ground against paper money issued by the government, either directly or through a bank owned by itself, but he saw no reason why the government should not be a partner in the bank, provided the management was in the hands of the private owners.

Hamilton's Report.

The bank act passed by Congress followed, for the most part, the plan which he proposed. The capital was to be $10,000,000, divided into 25,000 shares of $400 each. Eight millions of the capital stock was open to subscription by the public, one-fourth to be paid in specie and three-fourths in government obligations bearing 6 per cent interest, the subscriptions to be paid within two years. The remaining $2,000,000 of the capital might be subscribed by the United States, payable in ten equal annual instalments with interest at 6 per cent, and was so subscribed. Each shareholder

The Bank's Capital.

was entitled to cast one vote for one share, one vote for the next two shares, and so on, no shareholder being entitled to cast more than thirty votes. Foreign shareholders were not allowed to vote by proxy, and therefore practically could not vote at all. Not more than three-fourths of the directors were eligible for the next succeeding year. The bank could not hold real estate except for the immediate accommodation of its business, but it was not forbidden to lend on mortgage security. The bank could not become indebted for a greater amount than its capital stock, over and above the amount of its deposits, — that is, the deposits were not to be counted as liabilities, in estimating its right to contract debts. In case of excess, the directors were to be personally liable to creditors of the bank, but directors absent or dissenting might exonerate themselves by notifying the President of the United States and the stockholders at a meeting which they should have the power to call for that purpose. There was no other limit on the note issues of the bank than this. It meant substantially that the circulating notes might be equal in amount to the capital stock. The head of the Treasury should have the right of inspecting all of the affairs of the bank except the accounts of private individuals and could call for reports as often as once a week if he chose to do so. The notes of the bank should be receivable for all public dues as long as said notes were payable in gold and silver coin. The Treasury was not required to deposit the public money in the bank. The bank might have branches wheresoever the directors should see fit. It might sell any part of the public debt of which its stock was composed, but could not purchase any public debt whatsoever, nor trade in goods except such as might have been pledged for money loaned and not repaid. The rate of interest on loans could not exceed 6 per cent.

Regulations of its Charter.

The government pledged itself to grant no other charter for a bank during the continuance of this one, which was limited to twenty years. The bill passed the Senate December 23, 1790, without a division. It passed the House February 8, 1791; yeas 39, nays 20. All the affirmative votes, except three, were from states north of the Potomac, mostly of Federalists ; all the negative, except one, were from states south of it, mostly of anti-Federalists, or Republicans, as the followers of Jefferson were called.

President Washington called for the written opinion of the Attorney-General, Edmund Randolph, on the constitutionality of the bill. It was given adversely to the measure. He then asked for that of the Secretary of State, Mr. Jefferson. This was also adverse. Jefferson held that there was no warrant in the Constitution for the incorporation of a bank by Congress, and that it could not be considered "necessary" for carrying into effect any other power expressly conferred upon Congress. He admitted, however, that if, in the President's mind, the *pros* and the *cons* were pretty evenly balanced, the doubt ought to be resolved in favor of the bill, as a matter of respect and deference to the legislative branch of the government. The opinions of Randolph and Jefferson were then sent to Hamilton for such answer as he might be able to make, and he replied at considerable length and with great force. He held that the word "necessary," as used in the Constitution, did not mean absolutely necessary, but fitting and appropriate. He said that no power had been conferred upon Congress to establish lighthouses and buoys. The power to erect and establish these things was inferred from the power to regulate commerce and nobody questioned it, yet commerce could be regulated without lighthouses and buoys. Hamilton's arguments prevailed, and Washington signed the bill.

Constitutionality of the Bill.

Of regulations in the charter of this bank additional to, or different from, those of the earlier ones, mentioned in the preceding chapter, the most important are those relating to the composition of the bank's capital and to participation of the government as a shareholder. In explanation and defense of the provision which allowed three-fourths of the capital to be paid in the 6 per cent obligations of the government, Hamilton said in his report:

Reasons for Regulations.

> The chief object of this is to enable the creation of a capital sufficiently large to be the basis of an extensive circulation and an adequate security for it. . . . To collect such a sum in this country in gold and silver into one depository may, without hesitation, be pronounced impracticable. Hence the necessity of an auxiliary, which the public debt at once presents. This part of the fund will be always ready to come in aid of the specie; it will more and more command a ready sale and can therefore be expeditiously turned into coin if an exigency of the bank should at any time require it.

No exception need be taken to this argument, considering the time and circumstances of the case. Ordinarily it would not be considered good banking practice to accept anything but money as a part of the capital, even though some portion of it were subsequently invested in government bonds. Such investment should be left to the discretion of the directors after the organization is effected. Although, as Hamilton said, the bonds were intended to be the basis of circulation and an adequate security for it, they remained under the control of the bank and might be converted into money at any time.

The Government as a Shareholder.

The government's participation as a shareholder was not justified in this instance by necessity, as it had been, ten years earlier, in the case of the Bank of North America. Private persons were now eager to supply all the capital

required. If pecuniary gain were a sufficient reason for the government's participation, it could have been obtained more easily, and without risk, by a tax. Even if we conceive it expedient for the government to have been a shareholder at all, the clause which allowed it a long credit in paying for its stock was indefensible. It was a speculation on the part of the government, and a successful one as it turned out, but it set the example of paying for shares with "stock notes," which was the poison of banking in the United States for the next fifty years.

The provisions giving to the small shareholders greater voting power in proportion to their holdings than the large ones and requiring one-fourth of the directors to retire at the end of each year were intended to prevent the bank from passing into the control of a clique. These methods of distributing power in the management of banks were very generally adopted by the state legislatures in the first half of the nineteenth century, but their importance was evidently overestimated, since they have been wholly abandoned without any harmful consequences. The provision which prohibited the foreign shareholders from voting by proxy was intended to exclude foreign influence from the management. As the owners abroad would not be likely to cross the ocean in order to vote, they would not be able to vote at all. Foreign influence was very much of a bugbear at that time, but it does not appear that the shareholders in Europe ever betrayed any desire to vote or to exercise any influence whatever on the management.

Voting Power of Shareholders.

The provision that the note issues of the bank should not exceed the amount of the capital stock seems to have been unnecessary, since no report of note issues exceeding $5,157,378, or a little more than one-half of the capital, has reached us. Very few reports of the condition of the bank,

however, were published. It is not known whether the Secretary of the Treasury ever exercised his right of inspecting, or how often he called for reports of its condition. Only two such reports were submitted to Congress by Gallatin, both being in connection with the proposal to renew the charter.

Other Provisions.

The Treasury was not required to keep the public money in the bank, but it kept about two-thirds of it there, and the balance in state banks selected by the President. The parent bank was at Philadelphia. It had branches at Boston, New York, Baltimore, Norfolk, Charleston, Savannah, Washington, and New Orleans. It transferred the public funds from place to place at its own expense and paid the money on the order of the Treasurer of the United States wherever wanted.

The prohibition against the purchase of any public debt was adopted because it was believed that the bank would be able, with its large capital, to control the market and put the price of government securities up or down at its own pleasure.

The entire capital of the bank was subscribed for within two hours after the books were opened. It was a great financial success from the start. It began operations in December, 1791, and paid a dividend of 4 per cent in July, 1792. In 1809 Mr. Gallatin reported that the government had made a profit of $671,860 on the sale of its shares besides receiving dividends at the average rate of $8\frac{3}{8}$ per cent per annum. Of the 25,000 shares, 18,000 were held abroad and 7000 in the United States. The outstanding circulation at that time was $4,500,000; specie on hand, $5,000,000; deposits, $8,500,000; loans and discounts, $15,000,000, consisting mostly of sixty-day paper.

Great Financial Success.

The government, at that time, did not require the payment of customs duties on the delivery of the goods imported,

but accepted the bonds of the importers payable at a future date. The bank collected the payment of the bonds, and it refused to receive the notes of non-specie-paying banks. It thus established a standard of commercial honor and enforced it upon the banks chartered by state authority. In this way it became a regulator of the currency, but it incurred the enmity of the slovenly and fraudulent bankers of the period and of the second-rate traders and speculators by the rigidity of its rules.

A Regulator of the Currency.

In 1809 Secretary Gallatin recommended a renewal of the bank's charter with an increase of its capital to $30,000,000. War with England was impending, and Mr. Gallatin proposed that the bank should be bound in the new charter to lend three-fifths of its capital to the government if required to do so, and that it should pay interest on all government deposits in excess of $3,000,000. A contest of extreme bitterness ensued. The bank had been established in the first instance by the Federalists, who had lost political power during the past eight years, but were still strong in wealth and respectability. They had established the bank against Mr. Jefferson's ideas; and he, although yielding to Mr. Gallatin on practical measures and signing various bills supplementary to the original charter, had remained, both in his administration and in his retirement, a consistent foe to it. President Madison, who, as a member of the House, had opposed the original charter on the ground of unconstitutionality, was now disposed to look at the question as *res adjudicata*. He neither favored nor opposed a new charter. There was, however, a faction opposed to Mr. Gallatin which had its principal seat in Pennsylvania, its leaders being William Duane and Michael Leib. These men wanted to have certain changes made in the Federal offices in Philadelphia, which

Renewal of Charter proposed.

Mr. Gallatin refused on public grounds. The spoilsmen were determined to force Gallatin out of office if they could, and to this end they opposed everything that he favored. A clique in Maryland headed by the Secretary of State, Robert Smith, and his brother, Senator Smith, was equally bitter against Gallatin and consequently against the bank.

The Spoils System.

Notwithstanding this factional opposition the usefulness of the bank was so manifest that there would have been a strong majority for the new charter, if the question had come to a vote when the subject was first taken up. On the 2d of April, 1810, the House Committee, to whom the petition of the bank for a recharter had been referred, reported favorably. On the 21st of the same month a motion to postpone indefinitely was defeated; yeas 46, nays 67. Then the matter was laid over informally till January 4, 1811. The state banks took advantage of the delay to bring pressure on their local representatives against a recharter. They wanted to secure the government's deposits for themselves and to get rid of the competition of the great bank in other ways. Some persons who had more political influence than credit were incensed because their paper had been refused for discount at the bank. The Republicans seized this opportunity to be revenged on the Federalists. They denounced the bank as an aristocratic, and especially as a foreign, institution. One of the most vehement speakers against the bank, on account of the foreign holdings of its shares, was Henry Clay, who said in a speech in the Senate on February 15, 1811:

Opposition to the New Charter.

> Seven-tenths of its capital is in the hands of foreigners, and these foreigners chiefly English subjects. We are possibly on the eve of a rupture with that nation. Should such an event occur, do you apprehend that the English premier would experience any difficulty in obtaining the entire control of this institution?

Mr. Gallatin had exposed this fallacy two years earlier by showing that the foreign shareholders had no vote in the management and that, if the charter were not renewed, the portion of the bank's capital held by foreigners (mostly Englishmen), and amounting to $7,200,000, must be remitted to the owners at once. This demonstration of the impolicy of liberating and sending abroad more than $7,000,000 of specie at a time when we were likely to need every dollar of coin that the country contained had not the smallest effect on the anti-Federalist faction, except to increase their fury. Mr. Desha, a representative of Kentucky (February 12, 1811), considered this foreign capital one of the engines set to work to overturn civil liberty. He had no doubt that George III was a principal stockholder and that the latter would authorize his agent in this country to bid millions for a renewal of the charter. The new charter was not wanted except by a few speculating merchants who had become involved in debt and had borrowed money from "this foreign bank." The only way to save liberty, in his opinion, was "to assist in strangling this infant Hercules in the cradle." He concluded by suggesting that, unless the British government should rescind its clandestine measures affecting our rights, rather than renew the charter of the bank we ought to confiscate the British capital in it and use it in conquering Canada.

Alleged Foreign Influence.

The government had sold its own property in the bank to foreigners at a large premium. The last sale of 2220 shares had been made in 1802 at 145 to Sir Francis Baring, who had resold them in England at 150. The purchasers bought them as shares in an active concern. Of course, they were charged with knowledge that the charter would expire in 1811 and that it might not be renewed;

The Government's Shares in the Bank.

but it was not creditable in congressmen to declaim against foreign holdings as a reason for refusing a charter, when the government had pocketed a bonus of nearly $700,000 from these same foreigners in the expectation that it would be renewed.

The bank was not without friends among the Republicans. The best speech made for the new charter was that of Senator Crawford of Georgia, — a masterly effort from nearly all points of view. Senator Lloyd of Massachusetts made a strong speech on the same side, supplying some interesting items of banking intelligence. As showing the great convenience to the government of an apparatus by which payments could be made at specie value everywhere, without cost for the transmission of funds, he said that Penobscot bank notes would not pass in Boston at all times, that Boston bank notes passed with difficulty in New York and Philadelphia, while those of New York were not readily current in Washington. Mr. Clay held that Congress had no power to grant the original charter or to renew it. On March 2 he presented a report denying a petition of the bank for an extension of its charter sufficiently long to wind up its affairs. The report says that, "holding the opinion (as a majority of the committee do) that the Constitution did not authorize Congress, originally, to grant the charter, it follows as a necessary consequence of that opinion, that an extension of it, even under the restrictions contemplated by the stockholders, is equally repugnant to the Constitution." Five years later he was a strong advocate of the charter of the second Bank of the United States, saying that "that which appeared to him in 1811 under the state of things then existing not to be necessary to the general government, seemed now to be necessary under the present state of things. Had he then foreseen what now exists and no objection had lain against the

Senatorial Debate.

renewal of the charter other than that derived from the Constitution, he should have voted for the renewal."[1]

Charter refused.

The vote was taken in the House January 24, 1811, on a motion to postpone indefinitely, which motion prevailed by a majority of one, — 65 to 64. The vote in the Senate on a similar bill (February 20) was a tie, — 17 to 17, — whereupon George Clinton, the Vice-President, gave the casting vote against the bank. It was accordingly put in liquidation. It paid the shareholders $434 for each share of $400, *i.e.*, a surplus of nearly 9 per cent. Thus the country lost a most valuable financial institution. There was straightway a mushroom growth of new state banks to fill the void, so that one hundred and twenty were chartered and put in operation within three years. The government went to war in 1812, leaning upon the state banks for financial support. Most of them suspended payments in September, 1814, after which the country wallowed in irredeemable paper for several years. If the charter of the great bank had been renewed in 1811, specie payments would probably have been maintained throughout that crisis. Mr. Gallatin, writing many years later, said :

Mr. Gallatin's Opinion.

It is our deliberate opinion that the suspension might have been prevented at the time when it took place had the former Bank of the United States been still in existence. The exaggerated increase of state banks, occasioned by the dissolution of that institution, would not have occurred. That bank would as before have restrained within proper bounds and checked their issues, and through the means of its offices (branches) it would have been in possession of the earliest symptoms of the approaching danger. It would have put the Treasury Department on its guard; both acting in concert would certainly have been able at least to retard the

[1] *Annals of Congress, 1815–1816*, p. 1194.

event, and as the treaty of peace was ratified within less than six months after the suspension took place, that catastrophe would have been altogether avoided.

By restraining the issues of the state banks within proper bounds Mr. Gallatin meant that the bank would have presented their notes promptly for redemption, thus keeping their issues within the limit of safety.

RECAPITULATION

The first Bank of the United States was devised by Alexander Hamilton. It was one of a series of financial measures through which that statesman sought to bind the people of the newly formed Union together, by giving them certain pecuniary interests in common. The bank's charter was supported by the Federalist party and opposed by the anti-Federalists, or Republicans. It became a law in February, 1791, and the bank was put in operation in the following December. The capital was $10,000,000, of which $2,000,000 was subscribed by the government. The private subscriptions were payable within two years in half-yearly instalments; that of the government in ten equal annual instalments, with interest at 6 per cent. The charter of the bank was limited to twenty years, and the government agreed to charter no other bank during that period.

The bank was a great financial success. It paid dividends during the term of its existence, averaging $8\frac{3}{8}$ per cent per annum, and accumulated a surplus equal to about 9 per cent of its capital, which was eventually distributed to its shareholders. The parent bank was in Philadelphia, with seven branches in cities on the Atlantic seaboard and one in New Orleans. It collected the bonds of importers for customs duties and made transfers of money at the order of the Treasury, without expense to the government. It also made

advances of money to the government, when required, at the customary rate of interest. It served the purpose of a regulator of the currency by maintaining the highest standard of commercial honor, — a standard to which other banks were obliged to conform under penalty of being discredited in the eyes of the business community.

When its charter was about to expire the bank applied to Congress for a renewal of the same. The Federalist party was now in the minority, and its opponents made the granting of the proposed new charter a political issue. The state banks joined the opposition because they wished to get rid of the competition of the great bank and its branches. In the last year of its existence the bank was made a football of politics. Its usefulness from a financial point of view received very little attention in the debate on the recharter. The final decision was adverse to it, by a majority of one vote in the House and a tie in the Senate.

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CHAPTER VII

SECOND BANK OF THE UNITED STATES

THE second war with Great Britain began in 1812. Specie payments were suspended in September, 1814, by nearly all the banks south and west of New England. Their notes fell to a discount ranging from 10 to 30 per cent. The government had defaulted on the interest of the public debt. Its money was mainly in the suspended banks. The financial condition of the country was desperate.[1] Naturally the statesmen of the day bethought themselves of the Bank of the United States. On the 17th of October the Secretary of the Treasury, Mr. Dallas, recommended that a national bank be established with a capital of $50,000,000, of which one-tenth should be specie and the remainder government securities of one kind and another. It was to begin under a suspension of specie payments. As Daniel Webster said in the debate: "It was to commence its existence in dishonor; it was to draw its first breath in disgrace." Webster's speech of January 2, 1815, was fatal to this bill, for it was rejected by a tie vote. A reconsideration was moved and carried, and the bill was amended by striking

Financial Distress in 1814.

A National Bank proposed.

[1] "The government might possess immense resources in one State and be totally bankrupt in another; it might levy taxes to the amount of the whole circulating medium yet have only its own notes available for payment of debt; it might borrow hundreds of millions and be none the better for the loan."—HENRY ADAMS' *History of the United States*, VIII, 215.

out the clause requiring a specific loan to the government and the one authorizing the suspension of specie payments. In this shape it was passed by both houses; but it was vetoed by President Madison because it did not furnish sufficient financial aid to the government. The Senate thereupon took up the original Dallas Bill and passed it on February 11. But news that a treaty of peace with Great Britain had been signed at Ghent reached Washington on the 13th, and on the 17th the House, by a vote of 74 to 73, indefinitely postponed the measure.

As the war had come to an end, the Treasury was no longer in the desperate condition of the preceding year; yet Mr. Madison, in his message of December 5, 1815, suggested a national bank as an instrumentality for bringing about a resumption of specie payments. A bill for this purpose was reported to the House by Mr. Calhoun on January 8, 1816. It passed both houses and was signed by President Madison on April 10, 1816. The capital was to be $35,000,000, — four-fifths to be subscribed by private persons and one-fifth by the United States. There were to be twenty-five directors, five of whom should be appointed by the President of the United States, by and with the advice and consent of the Senate, and twenty elected by those stockholders who resided in the United States. Foreign stockholders could not vote either in person or by proxy. Both the notes and the deposits of the bank were to be paid in specie. It was authorized to issue post notes not smaller than $100 each, payable not more than sixty days after date. No circulating notes were to be issued of less amount than $5.00. All notes were to be signed by the President and the principal cashier. The notes should be receivable in all payments to the United States. The bank was to provide facilities for transferring the public funds, without expense to the

The Bank Charter of 1816.

government, to any places within the United States where payments were to be made. Section 16, regulating the public deposits, provided:

Public Deposits.

That the deposits of the money of the United States in places in which the said bank or branches thereof may be established shall be made in said bank or branches thereof, unless the Secretary of the Treasury shall at any time otherwise order and direct; in which case the Secretary of the Treasury shall immediately lay before Congress, if in session, and if not, immediately after the commencement of the next session, the reasons of such order or direction.

Other Regulations.

The bank was forbidden "to purchase any public debt whatsoever." In case the bank should fail to pay any note, obligation, or deposit, in specie on demand, it was to forfeit 12 per cent per annum on the amount of the claim. The government's subscription of $7,000,000 could be paid either in money or in its own obligations bearing 5 per cent interest. It was, in fact, wholly paid by the latter, *i.e.*, by a stock note, and the note was not fully paid until 1831. The bank was to pay the United States the sum of $1,500,000 as a bonus for the charter, which was to be exclusive and was to continue twenty years. It was forbidden to pay dividends to stockholders whose shares were not fully paid for. The directors were authorized to establish branch banks wheresoever, in the United States or the territories thereof, they should see fit.

Deposits payable in Specie.

Of the foregoing regulations the most important was the one which required the deposits to be paid in specie. Strictly speaking, all obligations payable in dollars were payable in specie. There was no other legal-tender money than gold and silver coin. Yet the conception prevailed universally that while a bank ought to pay its notes in specie on demand, it

might properly pay its deposits in the notes of other banks, near or remote, provided the latter paid their notes in specie. Consequently, even when the banks were solvent, there were two kinds of currency in circulation in every city: (1) specie and the notes of the local banks, which were at par; (2) the notes of banks of other cities and states, which were at a discount greater or less according to the difficulty of securing their redemption. This discount was not observed by the masses of the people. To them one dollar was as good as another. Anything that would pass was gladly accepted. But to merchants the discount on out-of-town bank notes was a considerable expense, and they sought to recoup themselves by charging enough for their goods to cover the loss. Daniel Webster was opposed to the pending bill in any shape, but he struck a blow for sound principles of currency by securing the adoption of an amendment providing that the deposits as well as the notes of the Bank of the United States should be paid in specie. It did not abolish everywhere the bad practice of having two kinds of bank notes in circulation at the same time and place, — one at par and the other at a discount, — but it abolished it in the operations of the great bank, and it established a standard of good banking which was never wholly lost sight of, and which reached its fulfillment in the Suffolk Bank system a few years later. Mr. Webster made another contribution to sound finance during this session of Congress by securing the passage of a bill requiring the payment of all government dues in specie, or in Treasury notes, or in notes of the Bank of the United States. Previously, any bank notes that were current at the places where the duties and taxes were collected had been accepted by the Treasury, although no banks except those of New England were at that time paying specie.

Duties and Taxes.

The power of the bank to issue post notes was curtailed in the charter, both as to the size of the notes and the time they should run. Post notes were bank notes payable, not on demand, but at a future time. They were a means of borrowing money from the public for fixed periods with or without interest. They were in common use in the first quarter of the nineteenth century. Sometimes the words containing the date of payment were printed in very small type, so that they were not readily seen and were accepted by some persons for demand notes. The recipients were thus defrauded. The restriction of post notes to denominations of $100 or more was made in order to prevent deception, since anybody receiving a note as large as $100 would be pretty sure to examine it carefully and to know whether it was payable on demand or otherwise.

Post Notes.

The provision requiring that all notes issued by the bank should be signed by the president and the principal cashier was adopted because that was the customary way of issuing such notes. There was a similar provision in the charter of the earlier bank. The fact that there are physical limitations on the power of a man to write his name, and that this bank was three and one-half times as large as the former one, did not occur to anybody until after the bank had gone into operation. Then it was discovered that no human being could perform the necessary labor. The bank officers asked Congress to amend the law so as to allow other persons to sign notes. There was no reason why the request should not have been granted, but Congress took no action. Consequently the bank adopted the practice of issuing drafts of $5.00 and $10 at the several branches, drawn on the parent bank. These drafts passed into circulation, to the amount of several millions. When the subject of a recharter of the bank came before Congress the issuing of these drafts was assailed as a violation of law,

Branch Drafts.

but an opinion had been obtained from Horace Binney, Daniel Webster, and William Wirt, before any such drafts were issued, that they would be legal.

The provision in reference to the deposit of the public funds in the bank became very important in the subsequent bank war in President Jackson's administration, and will be considered in connection with that event.

The clause imposing a penalty of 12 per cent per annum on any failure to pay specie on demand for any obligation of the bank was intended to make the suspension of specie payments unprofitable. There were in existence at that time many banks which were doing a flourishing business and actually paying dividends to their stockholders, but were not redeeming their own notes, or paying their deposits, except in the depreciated notes of other banks. If they had been under a penalty of 12 per cent per annum on all their defaulted paper, they would have made haste to resume specie payments.

Penalty for Suspension.

It would not be good policy now to grant exclusive privileges to a private bank, but if for any reason it were granted, it would be proper to exact a bonus from the beneficiaries. The exclusive privilege granted to the Bank of the United States consisted of the deposits of the government without interest, of the right to establish branches without consulting the state governments, and of the credit which those extensive privileges gave it in the eyes of the people and of foreign nations.

Bonus for Charter.

The bank established twenty-five branches under the authority granted to it. These were extremely useful to the country in the way of distributing the capital of the bank to the places where it was most needed. Thus, if there was a stronger demand for money at New Orleans than at Philadelphia, knowledge of that fact would be quickly conveyed by the branch at the former

Branch Banks.

place to the parent bank, and funds could be quickly transferred, either from the parent bank or from any branch where the demand was less pressing. One advantage of branch banking consists in the facility which it affords for gaining knowledge of the relative needs of business in different places and of responding promptly to those needs through agents already on the ground possessing the necessary local knowledge. The benefit is shared equally by the borrower and the lender. Branch banking tends to equalize the rates of interest among different localities in the same country.

Scandalous Beginnings.

The charter of the bank was made the basis of a shameful speculation, which brought it to the verge of ruin within two years. The law provided that the stock subscriptions of individuals should be paid in three instalments: 30 per cent at the time of subscribing, 35 per cent in six months, and 35 per cent in twelve months. One-fourth of the private subscriptions ($7,000,000) were to be paid in specie and three-fourths in specie or in the funded debt of the United States. When the second instalment became due only $324,000 was paid in specie where $2,800,000 was due; and for the third, only a trifling amount of specie or of anything else. The bank had discounted the notes of the stockholders on the pledge of their stock to the amount of more than $8,000,000. It also allowed the stock to be sold and transferred by the subscribers before it was paid for. This caused a great deal of trading in shares and a rapid advance in the price. When they rose above par the bank loaned more than par on them. In August, 1817, it authorized loans as high as $125 on $100 to shareholders who would furnish other security for the extra $25. This was easily furnished, as the shareholders indorsed for each other.

The provision of the charter prohibiting dividends on shares that had not been paid in full had been systematically

violated. The Baltimore branch had been defrauded, by its president and cashier, of $1,600,000. The bank at this time was really insolvent and it was held up only by the government's deposits, which amounted to $8,000,000. It was saved from impending bankruptcy by Mr. Langdon Cheves of South Carolina, who became its president in March, 1819. One of his measures of relief was the borrowing of $2,500,000 in Europe. Another was the requirement that the loans made on the security of the bank's shares should be paid at the rate of 5 per cent every sixty days. "Even this small reduction," said Mr. Cheves in his first official report, "was the subject of loud, angry, and constant remonstrance among the borrowers, who claimed the privileges and favors which they contended were due to stockholders."

The bank was put in a solvent condition by Mr. Cheves, and in the course of the next ten years became established in the confidence of the business community and interwoven in the policy of the nation as fully as the leading banks of the old world are now in their respective countries. It had five hundred employees of high standing and social position. Nicholas Biddle of Philadelphia became its president in 1823.

The Bank in 1829.

Notwithstanding the cerulean aspect of the sky overhead, there was a cloud gathering on the western horizon which is depicted by the latest historian of the bank in the following terms:

> Democracy, devoted to the principle of equality, is opposed to all forms of privilege, and to none more than to a monetary monopoly. When it is recollected that the Bank of the United States was at that time the one great monopoly in the country, and that against it were directed all the passionate opposition and fear which to-day fall upon banks, railroad companies, and trusts, its danger from the rising power of that fierce Democracy which, with

Andrew Jackson, swept over the country, may be faintly measured. The Democracy was positive that the bank was a menace to the political and social interests of the United States; that it made the rich richer and the poor poorer; that it depressed the weak and made the potent more powerful; that it accentuated the differences of society, creating on the one hand a powerful aristocracy and on the other hand an impotent and beggarly proletariat. These opinions were especially prevalent in the West, where Democracy was most powerful.[1]

Before he came to Washington as President, Jackson entertained the opinion that Congress had not the constitutional power to charter a bank outside of the District of Columbia. He had also expressed a dislike to all banks.[2]

RECAPITULATION

The second Bank of the United States was established in 1816, at the instance of President Madison, to put an end to the disorders in the currency consequent upon the War of 1812. The capital was $35,000,000, of which $7,000,000 was subscribed by the government. During its early years the bank was shamefully mismanaged and narrowly escaped destruction, but it was restored to a sound position in the year 1819, after which it became extremely prosperous. The charter was for the most part a copy of that of the first bank. The money owned or collected by the government at places where the bank or its branches existed was to be deposited in the bank or branches, but the Secretary of the Treasury might remove the same for reasons which he should communicate to Congress.

[1] Catterall's *The Second Bank of the United States*, p. 167.
[2] Catterall, pp. 183–184.

CHAPTER VIII

THE BANK WAR

THE charter of the great bank, granted in 1816, was to expire in 1836. When General Jackson came to Washington City as President in 1829, the subject of a renewal of the charter had not been discussed either in Congress or in the press. Probably nobody had given it serious thought.

The Question of a Recharter.

There had, however, been some conflicts between the bank and the state legislatures of Ohio, Kentucky, and Georgia, prompted by the jealousies of the local banks. The latter had accused the great bank of "accumulating their notes" and then presenting them for redemption in coin, thus making money scarce and disabling them from lending freely to their own customers. But this accumulating of the notes of the local banks resulted from receiving them as deposits. Not to have received them would have discredited, and perhaps ruined, the banks issuing them. To have received them as deposits and not to have presented them for payment would have been to transfer the capital of the great bank to the local banks without interest. From this dispute had arisen hostile legislation and prolonged litigation; but the conflicts had ceased, and the bank was at the height of its popularity and strength at the beginning of Jackson's administration.

The first visible sign of the coming trouble was contained in a letter written by Levi Woodbury, senator from New Hampshire, to Samuel Ingham, Secretary of the Treasury,

making complaints against Jeremiah Mason, one of the great jurists of New England, who was the president of the branch bank at Portsmouth. Woodbury and Mason were political rivals. The former accused the latter of bad manners, of partiality in the making of loans, and of using his financial influence for political ends. Mr. Ingham referred the letter to Nicholas Biddle, president of the bank, and added some comments of his own, implying that he thought there might be some truth in Woodbury's complaints.

First Signs of Political Conflict.

Three weeks later Mr. Isaac Hill of New Hampshire, second comptroller of the United States Treasury, wrote a letter asking for a change in the board of directors of the Portsmouth branch of the bank and for the removal of Mr. Mason as president. The letter was addressed to two of Hill's friends in Philadelphia, who were requested to present to the parent bank two petitions to that end, signed by citizens of New Hampshire, which were inclosed in his letter. Hill had been the editor of a rancorous Democratic newspaper and latterly president of a small bank in Concord, for which he wished to secure the pension deposits, which were placed by law in the Portsmouth branch of the great bank.

Isaac Hill.

A few months later Amos Kendall, fourth auditor of the Treasury, wrote a letter to Ingham, making accusations, which were afterwards shown to be false, against the Louisville branch of the bank, charging that it had interfered in an election there in 1825. These letters proved that there were politicians in Washington, near to the President, who had private and sinister ends to gain by attacking the bank. They accomplished their object, by persuading him that the bank was taking part in politics secretly and against himself. The charge was false: the bank never meddled with politics until compelled to do so

Amos Kendall.

in self-defense. It is possible, however, that its enemies believed that it was doing so.[1]

Biddle was led to believe, by conversations with Major Lewis, a close friend of Jackson, and also with Jackson himself, that the latter would favor, or at all events not oppose, a renewal of the bank's charter. Yet an undated paper in Jackson's handwriting, addressed to Biddle, was subsequently found among his manuscripts, saying that he (Jackson) had read the opinion of Chief Justice Marshall affirming the constitutionality of the bank, and that he could not concur with it. Biddle was greatly surprised to read in Jackson's first annual message to Congress, December 8, 1829, the following paragraph:

Jackson's First Message.

> The charter of the Bank of the United States expires in 1836, and its stockholders will most probably apply for a renewal of their privileges. In order to avoid the evils resulting from precipitancy in a measure involving such important principles, and such deep pecuniary interests, I feel that I cannot, in justice to the parties interested, too soon present it to the deliberate consideration of the Legislature and the people. Both the constitutionality and the expediency of the law creating this bank *are well questioned by a large portion of our fellow-citizens;* and it must be admitted by all, that it has failed in the great end of establishing a uniform and sound currency.

The statement that the bank had failed in the great end of establishing a uniform and sound currency puzzled

[1] "When, in any arena, a power is present which might be of decisive importance as an ally of one party or the other, it is inevitable that its alliance will be contended for by them. Its efforts to remain neutral will be vain and will expose it to greater danger from both than an alliance with either. Either party which thinks that it has lost the chance of winning the alliance will turn against the intervening party with fierce animosity and will try to destroy it or drive it from the arena. This is what happened in the case of the United States Bank." — SUMNER'S *Banking*, p. 192.

everybody, since that was the very thing that the bank had accomplished with conspicuous success. It remains doubtful to this day what Jackson meant by it. Albert Gallatin tried to find out from Jackson himself in what particular the bank had so failed, but could glean only mild surprise that such a question should be asked. Gallatin inferred that Jackson meant that the bank had not entirely abolished the rate of exchange between different commercial centers.[1]

Its Misstatements.

The bank had been established expressly to restore specie payments. This end had been accomplished mainly through its efforts and example. In order to facilitate resumption it had assumed at par $10,809,000 of government deposits then in suspended banks, at a cost to itself of some $200,000.[2] The whole banking system of the country had been wonderfully toned up since it came into the field. The rate of exchange between the most widely separated commercial centers ranged between par and one-half of 1 per cent, — a condition which, according to a report of the Senate Committee on Finance, existed in no other country.[3]

On December 10 the part of the President's message relating to the Bank of the United States was referred by the House to the Committee of Ways and Means. Its chairman (McDuffie of South Carolina) made a report on April 13, 1830, controverting, in respectful and temperate

[1] The average rate was probably from par to 1½ per cent, the average for 1829 being less than ¾ of 1 per cent. — CATTERALL, p. 141.

[2] Clarke and Hall, p. 777.

[3] "Before this bank went into operation exchange was from eight to ten per cent either for or against Charleston, which was a loss, to the planter, of that amount on all the produce of Georgia and South Carolina and indeed, you might say, all the produce of the Southern and Western states." — Letter of a Charleston merchant to the chairman of the Committee of Ways and Means (Clarke and Hall, p. 760).

Benefits of the Bank.

terms, the President's position at all points. The report was strong in its opposition to the statement that the bank had failed in the great end of establishing a uniform and sound currency. It was easy to prove by the market quotations how far superior the currency was then to that of any previous time, and especially to that of the period immediately before the establishment of the bank, when the paper currency of the middle states ranged from 7 to 25 per cent below par. The report went beyond a mere statement of the fact that the currency had been put on a uniform and sound basis. It argued strongly that this improvement had been brought about by the Bank of the United States and would not have taken place otherwise. It said:

Bank sustained by Congress.

The Committee are aware that the opinion is entertained by some that the local banks would, at some time or other, either voluntarily or by the coercion of the state legislatures, have resumed specie payments. In the very nature of things this would seem an impossibility. It must be remembered that no banks ever made such large dividends as were realized by the local institutions during the suspension of specie payments. A rich and abundant harvest of profit was opened to them, which the resumption of specie payments must inevitably blast. While permitted to give their own notes bearing no interest, and not redeemable in specie, in exchange for better notes bearing interest, it is obvious that the more paper they issued the higher would be their profits. The most powerful motive that can operate upon moneyed corporations would have existed to prevent the state banks from putting an end to the very state of things from which their excessive profits proceeded. Their very nature must have been changed, therefore, before they could have been induced to coöperate voluntarily in the restoration of the currency. It is quite as improbable that the state legislatures would have compelled the banks to do their duty. . . . The banks were, directly and indirectly, the creditors of the

The Previous System.

whole community, and the resumption of specie payments necessarily involved a general curtailment of discounts and withdrawal of credit which would produce a general and distressing pressure upon the entire class of debtors. These constituted the largest portion of the population of all the states where specie payments were suspended and bank issues excessive. Those, therefore, who controlled public opinion in the states where the depreciation of the local paper was greatest were interested in the perpetuation of the evil.

The report of the Committee was sustained by a decisive majority of the House, and a similar one from the Senate Committee on Finance was sustained by that body.

There was some correspondence between Biddle and Ingham in reference to the charges made by Woodbury and Hill against Jeremiah Mason. Biddle easily proved that the charges were without foundation. It would have been well for him if he had rested there; but he thought that he had detected in Ingham's letters the assertion of a right on the part of the administration to control or influence the bank's selection of its officers, and he wished to let Ingham know that this was a mistake. He therefore added that the bank was under no responsibility to the Secretary of the Treasury respecting the political opinions of its officers. Ingham retorted that the Secretary had power to remove the government's deposits from the bank, and that he might exercise that power, if he were convinced that the bank was exercising political influence. In his literary and forensic zeal Biddle had overlooked the power of coercion that lay in the hands of the Secretary. He was worsted in this encounter, but his error of tactics was not necessarily fatal.

Biddle and Ingham.

In his message of 1830 the President again alluded to the bank, and suggested that a bank might be established as a branch of the Treasury Department, in order to avoid constitutional objections. Such a bank, he said, having no

means to operate on the hopes, fears, or interests of large masses of the community, would be shorn of the influence which made the existing bank formidable. A motion was made in the House to refer this part of the message to a special committee, on the ground that the Committee of Ways and Means had already given its opinion in favor of the present bank. This motion was voted down, by 108 to 76.

Jackson's Message of 1830.

In 1831 the message took a milder tone, saying that the President had felt it his duty frankly to disclose his opinions on the subject in former messages.

Milder Tone of the President.

> Having thus conscientiously discharged a constitutional duty [he continued], I deem it proper on this occasion, without a more particular reference to the views on the subject then expressed, to leave it for the present to the investigation of an enlightened people and their representatives.

The bank's charter ran till 1836. There is good reason to believe that if Biddle had postponed, until after the presidential election of 1832, his attempt to procure its renewal, he might have obtained it without any serious opposition and with the concurrence of the President. All the members of the cabinet, except Taney, were favorable to the bank, and two of them (McLane and Livingston, of the Treasury and State Departments) actively so. Both of these urgently counseled him not to stir up the fighting element in Jackson, and not to incur the risk of embroiling the bank in the political campaign. In a letter to James Hamilton (December 12, 1831), Jackson said: "Mr. McLane and myself understand each other, and have not the slightest disagreement about the principles which will be a *sine qua non* in my assent to a bill rechartering the bank."[1]

Biddle was a headstrong character and was the autocrat of the bank. He had always maintained heretofore that the

[1] Catterall, p. 213.

bank should not meddle with politics. He had once affirmed in writing that if the bill for a new charter were brought forward prematurely, it would be "blended up with the election and become one of those political matters judged exclusively by party considerations." He was warned by McLane that if the bill were forced upon Jackson before the election he would regard it as a challenge and would veto it. Why, then, did Biddle, with this enormous responsibility resting upon him, take the risk of giving the challenge?

Baltimore Platform of 1831.

In the first place the party opposed to Jackson (the National Republicans) made the bank question an issue in their platform, adopted at the Baltimore Convention in December, 1831. They declared that the bank was a great, beneficent, and necessary institution, and that the President was "fully and three times over pledged to the people to negative any bill that might be passed for rechartering the bank." This convention nominated Henry Clay for President in opposition to Jackson. Mr. Clay, however, was not primarily an agent in dragging the bank into politics. Mr. Catterall shows that he deprecated the policy of making application for a new charter before the Presidential election. He held to that opinion till the eve of the Baltimore convention, but he sided with his party, whose candidate he was, when its platform was promulgated.

Henry Clay and the Bank.

The bank had been, until this time, a non-resistant, and that was one reason why Jackson's animosity had cooled. It was still reluctant to enter the political arena. Biddle hesitated, but was finally persuaded by the argument that the bank must put itself in the hands of its friends rather than of its enemies. Accordingly, he wrote a memorial asking for a renewal of the charter, which was presented to the Senate on the 9th of January, 1832. The old charter still had four years to run. The motion for a renewal of it at this

time was premature, unless the friends of the bank wanted to make it a political issue against Jackson in the presidential campaign.[1]

Before any vote was taken in Congress, however, an incident occurred which led Jackson to think that the bank was financially unsound. On the 24th of March, 1832, Mr. Asbury Dickins, Acting Secretary of the Treasury, notified Mr. Biddle confidentially that the government desired to apply a portion of its money deposited in the bank to the payment of the outstanding 3 per cents, — a remnant of the revolutionary debt. The public deposits now amounted to $12,000,000, and the debt to be paid off was $9,000,000. Secretary McLane gave Mr. Biddle formal notice of this purpose on the 25th of July, and Biddle replied that the bank would take the necessary steps to get possession of the bulk of the 3 per cents and would act in accordance with the wishes of the government. In the meantime General Cadwalader, a director of the bank, had been sent to London to make a private arrangement with the Barings for postponing the payment of $5,000,000 of the debt. A contract was made with that house to extend as many of the 3 per cents as possible and to buy up the rest. This was a violation of the bank's charter, which prohibited it from purchasing any public stocks. It was equally a violation of the understanding with the Treasury; since, under the Baring contract, the 3 per cents would be kept alive, the bank paying the interest and being responsible eventually for the

Affair of the 3 Per Cents.

[1] "The position then was that Jackson had made the challenge, had receded from it, and his opponents had taken it up and turned it as a challenge against him. What would he do? It seems that no one who knew the facts in his career could doubt what he would do. He would return to the issue and would fight it out regardless of all considerations whatever, to a definite and conclusive victory or defeat. That is what he did do." — SUMNER'S *Banking*, p. 200.

principal. Money was worth 7 per cent to the bank; and by this scheme it would obtain the use of the government's money at 3 per cent.

It was Biddle's intention to keep the matter secret, but the Baring circular was published in the newspapers in October. Biddle immediately disavowed Cadwalader's contract with the Barings, in so far as related to the buying of the debt, and proposed a different arrangement. Secretary McLane called on Biddle for explanations, and the latter replied that he had taken this step for the public good. A visitation of cholera was expected, which threatened, he said, "if it continued, to press with peculiar force on the public revenue, more especially as the demand on account of the foreign holders of 3 per cents on the first of October, at New York and Philadelphia alone, would have exceeded five millions of dollars." So the bank had interposed itself as a providence between the people and the government because the cholera was expected, and had done so in a clandestine manner. Jackson was fully justified in considering this a subterfuge, and was freshly exasperated by it; but it did not follow, as he supposed, that the bank was insolvent.

Mr. Biddle's Duplicity.

The affair of the 3 per cents was going on while Congress was acting on the new charter. On the 9th of June the bill passed its third reading in the Senate, by 25 to 20. Now the friends of the bank, who were also friends of the President, made one more effort to prevent a conflict. They entreated Mr. Biddle to pause and let the bill rest until after the election. If he had had his choice, he might have taken this advice; but he was "threatened with opposition from the party, then his chief reliance, unless he went on."[1] They said that Jackson would not dare to veto the bill, and

[1] Ingersoll, II, 269.

that if he did, he would be hurled from power by an indignant people. So they passed the bill in both houses and sent it to the President on the 6th of July. Then one more challenge was given to him. The House on the 28th of June had voted to adjourn on the 9th of July, and the resolution was not acted on by the Senate until the 9th. Then Mr. Webster said that there was an important measure under consideration by the Executive, which he was not compelled to return in less than ten days. The House resolution was then amended, by inserting the 16th. This was equivalent to saying to the President: "You must sign the bill or veto it. You shall not kill it silently."

The Charter passed.

The next day, July 10, the veto came. It was perfectly adapted to its purpose of winning votes. It dealt with the bank as a monopoly, ringing all possible changes on that term, and in the most skillful manner. It is supposed that Amos Kendall wrote it; for, although Jackson was no demagogue, this was a most demagogical appeal. The friends of the bank were in high glee when they saw it. Biddle wrote to Clay:

The Charter vetoed.

> I have always deplored making the bank a party question, but since the President will have it so, he must pay the penalty of his own rashness. As to the veto message, I am delighted with it. It has all the fury of a chained panther biting the bars of his cage. It is really a manifesto of anarchy, such as Marat or Robespierre might have issued to the mob of the Faubourg St. Antoine; and my hope is that it will contribute to relieve the country from the dominion of these miserable people. You are destined to be the instrument of that deliverance, and at no period of your life has the country ever had a deeper stake in you. I wish you success most cordially, because I believe the institutions of the Union are involved in it.[1]

[1] Parton's *Life of Jackson*, III, 411.

This was not the first time that Biddle's literary talents had betrayed him. Four months later he and Mr. Clay and the bank went down with a grand crash, for Jackson was reëlected by 219 electoral votes, to 67 for all others. Mr. Clay received 49. Nobody at the present day considers Biddle a good banker. Few persons regret the Bank of the United States; but if its taking off was a national misfortune, Mr. Clay and his party were as much to blame as General Jackson and his party. They made the bank a political issue at a time when defeat to them meant destruction to it. The attempt to pass the bill over the veto failed in the Senate, 22 to 19.

Jackson's Victory.

The bank war continued through the whole of Jackson's second administration, embracing several exciting episodes, but they belong rather to the political than the financial history of the time. Early in 1833 the President decided that the government's deposits ought to be removed from the bank. He suggested this project to Secretary McLane, who demurred. The matter was brought up in the Cabinet, and two-thirds of the members sided with McLane. A vacancy happening in the State Department, McLane was transferred to it, and William J. Duane was appointed Secretary of the Treasury. Duane had been opposed to the original charter of the bank and to the recharter, but he looked upon the public deposits as a part of a contract between the government and the bank. He declined to transfer them, when requested by the President to do so. Consequently he was removed from office, and Roger B. Taney, the Attorney-General, was placed at the head of the Treasury Department. Taney began, in the autumn of 1833, to draw out the money for ordinary disbursements, depositing the ordinary receipts in certain state banks which had been selected for the purpose.

The Deposits removed.

When all hope of a renewal of the national charter had disappeared, Mr. Biddle sought and obtained a charter from the state of Pennsylvania. An enormous bonus was paid to the state, — $2,500,000 in cash and a promise of $100,000 per year for twenty years, besides various subscriptions to the stock of railroads, canals, and turnpikes in the state. Senator Benton said that every circumstance of its enactment betokened bribery of the members who passed it and an attempt to bribe the people by distributing the bonus among them. The government was still a shareholder in the bank to the par value of $7,000,000, and there was some trouble in withdrawing this money, but it was paid in four annual instalments at the rate of 115.58. New stock was sold in place of it, so that the capital remained at $35,000,000, which was a far greater sum than could be used in ordinary banking operations in its restricted territory. Jackson's plans were now fully carried out, except that the bank was not killed. The government had recovered every dollar of its own money, and the bank was on the way to kill itself more miserably than even its enemies could have wished.

The Pennsylvania Charter.

When the bank found itself, with its enormous capital, restricted to Philadelphia and the neighboring country, it gradually changed its character. Hitherto it had confined itself to its proper business, discounting commercial paper, buying bills of exchange, and dealing in coin and bullion. Now it advanced money largely on stocks. Before March, 1836, it had $20,000,000 thus invested. The country was in the fever of speculation which culminated in the panic of 1837, and the bank was the leading speculator. It suspended in 1837, in common with nearly all the other banks; again in 1838; and a third and last time in 1841. Its liquidation was protracted through fifteen years. It paid its creditors in full,

Wild Speculation.

principal and interest, but the shareholders lost every penny. Biddle lost all of his own money. His town house and his country house were sold by the sheriff. Old friends cut him on the street. He was even indicted by the grand jury for conspiracy to defraud the shareholders of the bank, but the indictment was quashed. He died in 1844, poor and broken-hearted.

Final Collapse of the Bank.

RECAPITULATION

The second Bank of the United States became involved in political strife through no fault of its own. In the year 1829 certain politicians, who were on terms of intimacy with President Jackson, desired to have the president and directors of the branch bank at Portsmouth, N. H., removed for their own private ends. Mr. Biddle, the president of the parent bank, refused to comply with their wishes. They persuaded the President that the bank was secretly taking part in politics adversely to himself. Although the charter had seven years still to run, President Jackson, in his first message to Congress (December, 1829), made a hostile reference to the bank, suggesting doubts as to its constitutionality and affirming that it had failed of the main purpose for which it was established. Both houses of Congress took action upon the message, in a sense favorable to the bank. In 1830 the President again referred to the bank in his annual message, but his tone was less hostile than before. In 1831 he approached the subject again, but in a still milder way, saying that he should now leave the question to the enlightened judgment of Congress and the people.

The party opposed to Jackson mistook his change of tone for a symptom of fear, and decided to make the recharter of the bank the main political issue of the presidential campaign of 1832. They framed their platform accordingly

and nominated Henry Clay for the presidency. Jackson accepted the challenge and resumed his fight against the bank. While the political contest was going on, Congress passed a bill for a new charter, the President vetoed it, and the attempt to pass it over the veto failed. President Jackson was reëlected by a large majority in 1832. In the following year he caused the government's deposits in the bank to be removed from it. Before the charter expired the president of the bank obtained a charter from the legislature of Pennsylvania and reorganized the bank under it with the same capital ($35,000,000). This was too large a sum to be profitably employed in the discount of commercial paper in Philadelphia. The bank then entered into various speculations by advancing money on the shares of joint stock companies in all parts of the Union. It failed disastrously in 1841, and the shareholders lost their entire capital. The government had ceased to be a stockholder in 1836, its shares having been paid off at a premium of $15\frac{1}{2}$ per cent.

Both the first and the second banks of the United States became involved in political strife without any intention of their own, and in spite of their earnest efforts to avoid such entanglements.

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CHAPTER IX

THE SUFFOLK BANK SYSTEM

THE growth and development of banking in Massachusetts not only form an interesting chapter in our economic history, but give us suggestions of the highest importance in the consideration of current banking problems.

Stock Notes.

During the first half of the nineteenth century there was a struggle in Massachusetts, as in nearly all the states, to compel the subscribing shareholders of banks to pay for their shares. Banking was the favorite form of speculation. A bank lends its notes to borrowers and receives interest on them, but the notes are themselves debts of the bank. Thus banking presented itself to the public mind seductively as a method of living on the interest of the debts you owe. Bank charters were eagerly sought. The speculators in shares were not slow to perceive that, if they could put their own stock notes into the bank instead of cash, they might get something for nothing.[1] If the bank survived, the dividends would probably exceed the interest on the stock notes, the difference being a clear gain to the shareholders, without any investment of their own money. The policy of Massachusetts in this regard was generally sound, but it was variable, showing that some people could get inserted in bank charters privileges which others could not get. In 1795 the charter of the Nantucket Bank contained a provision that no stockholder

[1] Professor Sumner found two state bank charters, both in Louisiana, which expressly authorized the payment of the capital in stock notes, one dated 1811 and the other 1818. — *History of Banking*, p. 61.

should be allowed to borrow at the bank, as or after any instalment should become due, until he should have paid his full proportion of such instalment. This did not, however, prevent borrowing the money after it had been paid in. In the following year the Merrimac Bank of Newburyport was chartered with a capital stock of not less than $70,000, nor more than $150,000. Here we find an attempt to evade the principle affirmed in the charter of the Nantucket Bank. No loans were to be made to shareholders until they had paid their proportion of $70,000. If they should choose to have a capital of $150,000, they might borrow from the bank itself all except the first $70,000.

There was much contrariety of legislation until 1804, when several charters contained an express provision that no money should be loaned to anybody until satisfactory evidence was presented to the governor and council "that the whole capital stock aforesaid is actually paid in and existing in gold, silver, or other coined metals, in their vaults." Even this provision was not sufficient; for it was proved in more than one case that banks borrowed the entire amount of their capital in gold and silver coin from other banks and, having exhibited it to the public officers, returned it to the rightful owners the same day. Accordingly, in 1811, a clause was inserted in bank charters requiring the directors to take an oath that the money paid in was intended to remain there as the capital of the bank. This proviso was considerably amplified and strengthened in 1813. Three commissioners were to be appointed by the governor to count the gold and silver and take the oath of the directors that it had been paid in, *bona fide*, by the stockholders as the bank's capital and for no other purpose, and that it was intended to remain there. In 1822 it was enacted that no dividends should be declared until the whole capital was paid in.

Struggle to compel Payment of Capital Stock.

The currency was now very chaotic. Country bank notes were at a discount of 1 to 5 per cent in Boston, according to the difficulty of sending them home for redemption. It was an advantage to a bank to place itself at a long distance from the centers of business and on the worst possible road, to avoid redemption.[1] Sharpers and speculators seized the opportunity to make gains. They bought or established banks for the purpose of putting notes in circulation at long distances from their place of issue, in order to postpone the redemption of them. They swapped notes with each other for this purpose. The Boston Exchange Office was incorporated in 1804 to facilitate the business of swapping bank notes. One Andrew Dexter bought up the stock of the Exchange Office and used it as a machine for swapping the notes of different banks owned or controlled by him, till he brought ruin upon the banks, the community, and himself. His failure was one of the most direful events in the economic history of New England.

Chaos of Banking in New England.

The New England Bank, which was incorporated in 1813, gave the first impulse to what was afterwards known as the Suffolk Bank system, by publishing an advertisement that it would receive country bank notes and send them home for redemption, charging only the actual cost. The average cost on those of Massachusetts was one-half of 1 per cent. This became the rate of discount on such notes in Boston. On those of other New England banks it ranged from 1 to 5 per cent.

The New England Bank.

The country banks discounted commercial paper in Boston, as well as at home, paying out their own circulating notes therefor. As these notes were below par in Boston, but

[1] "What New England did in the first decade of the century is what the middle states did in the second and the Southwest in the fourth and the Ohio states in the sixth." — SUMNER'S *History of Banking*, p. 37.

were generally accepted by merchants, Gresham's Law came in play; that is, the worse money drove out the better. The notes of the Boston banks were immediately returned to them by depositors, because they were received at par, but those of the country banks were paid out by manufacturers and traders for wages and as change, and thus kept in circulation. In the year 1818, when the Suffolk Bank was chartered, the Boston banks, seven in number, having more than half of the banking capital of New England, had only one twenty-fifth part of the circulation. The New England Bank had reduced the cost of redeeming country bank notes to a minimum before the Suffolk entered the field, but the cost was borne by the note holders. The Suffolk managers conceived the idea of putting the cost of redeeming them on the issuers, and of abolishing the discount entirely. Its object was to make a profit for itself, but it accomplished much more, as the sequel will show. The plan proposed by the Suffolk was that it would redeem any New England country bank notes at par if the issuing banks would keep a permanent deposit of $5000 in the Suffolk Bank (the interest on which should compensate it for doing the business), plus a further deposit sufficient to redeem such of their notes as should reach Boston in the course of trade.

The Suffolk Bank.

To the country bankers of that day nothing more exasperating than this plan could have been imagined. They declined it because it seemed likely to curtail their circulation and the profits derived therefrom. Then the Suffolk began to collect their notes systematically and send them home for redemption in specie. The country banks were furious. They said that the Suffolk was demanding of them an impossibility, — that of redeeming their notes in two places at once. The Suffolk had demanded no such thing. It

Country Banks asked to redeem in Boston.

had merely offered them the alternative of redeeming their notes in Boston or at their own counters. The fight was bitter. The Suffolk maintained it at first single-handed. In 1824 the other Boston banks became convinced that it was time to put an end to the uncurrent money that was displacing their own notes in the field of circulation. They joined the Suffolk and contributed a large fund to enable the latter to extend its operations to all parts of New England. The run on the resisting banks was continued until they began to come in and make the deposits required. The terms offered were that each country bank should make a permanent deposit with the Suffolk of $2000 or upwards, according to the amount of its capital, and such additional sum as might be necessary to redeem all of its notes that should come to Boston. From banks which complied with these conditions the Suffolk offered to receive at par the notes of any New England bank in good standing. In other words, the Suffolk would not require the country bank to remit drafts on Boston payable in specie to make its balance good, but would accept as specie the New England notes which the country bank was habitually receiving in the course of its business. Thus the Suffolk became a clearing house for the notes of New England banks in Boston, balancing them against each other every day. When the notes were sorted and redeemed they were placed in packages and held subject to the order of the issuing bank.

The Forcing Process.

In 1845 the state of Massachusetts passed a law providing that no bank should pay over its counter any notes but its own, and this law remained in force until the national banking system superseded the Suffolk system. As no bank could pay out the notes of any other bank, it was compelled to send those which it took on deposit to the Suffolk at once for redemption. This law enforced the principle that

everything paid over a bank's counter must be the equivalent of specie. The whole Suffolk system was based on this principle, and the battle which it started was fought in order to enforce it. A slovenly idea had pervaded the whole country that specie redemption, although good in theory, was bad in practice. This conception was only slowly uprooted, first in New England, afterwards in New York, and later in Louisiana and in some other spots, but it held the ground over the larger part of the country until the Civil War. Mr. D. R. Whitney, in his history of the Suffolk Bank, says:

Basis of the Suffolk System.

> It was the underlying principle of the Suffolk Bank system, that any bank issuing circulation should keep itself at all times in a condition to be able to redeem it; that it should measure the amount by its ability so to do; and that the exercise at any time of the right to demand specie of a bank for its bills was something of which the issuing bank had no right to complain.

Nevertheless, there were some complaining banks all the time, though after the system had been fairly established these were only a small minority. The panic of 1837 caused a general suspension of specie payments. When the time came for a general resumption, the question of renewing the Suffolk system was open to debate. The banks of Massachusetts, New Hampshire, Vermont, and Connecticut voted at once to sustain it, whilst those of Maine and Rhode Island came in soon afterwards. The Suffolk Bank system gave wide credit to the New England banks, and in consequence their notes gained an extensive circulation in remote parts of the country and in Canada. In 1857 five hundred banks were embraced in the system.

Its Popularity and Success.

Under such circumstances the Suffolk took upon itself the office of a comptroller of the currency. It did not admit a new bank to the fellowship of the system merely

because it had procured a charter, perhaps by favoritism, perhaps by bribery. It first satisfied itself that the shareholders were men of good character and that the institution had been started in good faith. Of course, the Suffolk could not prevent the newcomer from issuing notes, but it could withhold its passport and thus prevent it from getting any extensive circulation. The precautions which it took in admitting newcomers were taken for the credit and good name of New England banking.

Small Losses.

The Suffolk Bank suffered some losses in consequence of advances to country banks, but these did not prevent it from declaring dividends at the average rate of 11½ per cent per annum. The losses which it incurred from counterfeits and alterations in notes were very small. From 1836 to 1846 the losses by counterfeit notes were only $1107, from alterations $766, and from counterfeit signatures on genuine notes $82, although the redemption at that time exceeded $100,000,000 per year. In 1824 two clerks could do all the work. In 1855 seventy were required, and the redemptions reached $400,000,000 per year. As the circulation of the New England banks at that time was about $40,000,000, the whole amount was redeemed ten times each year, or about once in five weeks.

The "Banking Principle."

Any person engaged in a legitimate trade, in any part of New England, could exchange his promissory note, running sixty or ninety days, for the notes of a bank, with which he could pay the wages of his employees or buy the materials of his industry in any part of the United States or Canada. The notes would remain in circulation about five weeks, and then find their way to the Suffolk Bank, where they were offset by the notes of other banks which took their rise in the same way. The man whose promissory note the bank had discounted, and by means of which it had put its own notes in circulation,

had meanwhile sold his products. If he had sold them in Boston, his draft on the Boston merchant would pay his note at the local bank, and this would enable the latter to keep its balance good at the Suffolk. If he had sold them in New York or Chicago, he would get his pay in a draft on Boston, which would answer the same end. If he had sold them at home and had received New England bank notes in exchange for them, the local bank could use these to keep its balance good at the Suffolk. New England trade was carried on by an endless chain of offsets and book balances at the Suffolk Bank. The security for the notes consisted of the bank's assets and the banker's moral character and business sagacity. Both notes and deposits rested upon the same security that deposits rest upon now, and the volume of both was determined by the wants of trade.

The foregoing method of issuing circulating notes is called the "banking principle," — a term used in contradistinction to the "currency principle," which assumes that a certain amount of paper currency will be wanted by the community at all times and that the government may advantageously issue it, either directly or through an agency like the Bank of England. As the latter principle is now operative in England, the average amount which will always circulate and which the community will never send in for redemption if satisfied of its goodness, is first ascertained experimentally. If, in the progress of time, more notes are wanted than the ascertained sum, they must be bought with gold. Thus the Bank of England is required to give its notes for all the sovereigns offered to it, or for gold bullion of equal value. In like manner the Treasury of the United States must issue gold certificates to all persons tendering American gold coin to it.

The "Currency Principle."

Specie Reserve.

Under the Suffolk system of bank-note redemption, specie was seldom asked for, but it was always paid when demanded. The metallic reserve was the touchstone of the whole business. The banks learned by experience how many notes would circulate and how much specie was needed. It was not until 1858 that the state of Massachusetts, in consequence of the panic of 1857, established a legal reserve of 15 per cent of specie against both deposits and circulation. Country banks might count their balances in Boston banks, payable on demand, as specie, for experience had shown that notes were best redeemed at a common center, where the gold reserve should be kept. Prior to the passage of the law of 1858 the specie reserve had been extremely variable, ranging from 44 per cent in 1843 to 7½ per cent in 1851. There was a heated controversy over the passage of this law. The bankers were generally opposed to it, on the ground that it was unnecessary meddling, but public opinion sustained it. After the passage of the law the specie reserve rose considerably above the legal requirement and afterwards oscillated around it, being sometimes a little more, and sometimes a little less, than 15 per cent. This law did not touch the other New England States, whose banks were integral parts of the Suffolk system. In 1859 Maine, Rhode Island, and Connecticut each had 10 per cent of specie as against circulation and deposits, New Hampshire 7½ per cent, and Vermont only 6 per cent.

The Suffolk Bank system continued until it was superseded by the national banking system, which required each bank to receive the notes of every other bank at par for all dues to itself.

Massachusetts enacted general banking laws in 1805, in 1828, in 1835, in 1860, and in 1880. Her banking law, as it existed before the national system came in force, consisted

of two parts, one relating to chartered banks, and the other to free banks. A free banking law, which allowed persons to organize banks at their own pleasure, on condition of depositing with the state officers bond security for their circulating notes, had been passed in 1851, but only seven banks were organized under it. The following were among the provisions of law relating to banks in 1860: No individual could hold more than one-half the stock of any bank; no person could be a director of more than one bank; no person could be a director whose stock was pledged for debt. Neither the debts nor the credits of a bank could exceed twice the capital stock paid in, except for deposits and for debts to or from other banks. No bank could pay out any notes but its own; or issue any notes, directly or indirectly, except at its own banking house; or issue any notes with the understanding that they should be kept out a certain length of time. No bank could make a loan repayable in anything except specie or its own notes. In case of bank failure the note holders were to have a prior lien on the assets. If any new banks should be chartered with greater privileges than those here enumerated, the same privileges were to extend to all other banks. Three bank commissioners were appointed to examine all banks once each year — or oftener if they deemed it expedient — and to publish the results of such examinations.

Massachusetts General Laws.

RECAPITULATION

In the first quarter of the nineteenth century the notes of country banks were at a discount in all the commercial centers. If the discount was not excessive, they passed from hand to hand in trade, but they were not received by the city banks except at their actual value. The notes of the city banks, on the other hand, by reason of their goodness,

were promptly returned to them as deposits or in payment of loans. Under the operation of Gresham's Law the worst money that would circulate drove out the better. The Boston banks, although possessing more than half the banking capital in New England, had only one twenty-fifth part of the circulation. Country bank notes accumulated in the hands of merchants, and they either sold them to brokers or sent them by messengers to the issuing banks for redemption. The discount in Boston on the notes of Massachusetts country banks averaged ½ per cent. On those of the other New England States it ranged from 1 to 5 per cent according to the distance of the banks and the cost of securing redemption.

The Suffolk Bank of Boston was chartered in 1818 as an ordinary bank of issue and deposit. Its managers conceived the idea of making a profit out of the redemption of country bank notes. They offered to redeem all such notes at par, if the issuing banks would provide funds for that purpose and would also make permanent deposits in the Suffolk Bank, the use of which should compensate it for its trouble. At first only a few of the country banks acceded to this proposal. The Suffolk Bank then sent home for redemption all the notes of the non-assenting banks that it could get. The other Boston banks joined the Suffolk and contributed a fund for carrying on the campaign in all the New England States. Eventually all the country banks were forced into the arrangement, because it was found to be cheaper to redeem their notes in Boston than at home. They found also that under the Suffolk system their credit was so much improved that their notes gained circulation in all parts of the United States and Canada. The system was, in fact, advantageous to them as well as to the public.

When the system had been thoroughly established, the Suffolk Bank accepted the notes of all solvent New England

banks at par and offset them against each other, thus serving as a clearing house for New England bank-note issues. The legislature of Massachusetts testified its approval of the system by passing a law prohibiting banks from paying out any notes but their own, thus making it necessary to send to the Suffolk for prompt redemption the notes of other banks which came into their hands.

The redemptions, or clearings, at the Suffolk Bank reached the sum of $400,000,000 per year. As the total circulation of New England banks at that time was only $40,000,000, it followed that the notes were redeemed, on the average, ten times each year. The Suffolk system continued until 1865, when it was superseded by the national banking system. It brought banking in New England to a state of responsibility, order, and solvency unknown before.

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CHAPTER X

THE SAFETY FUND SYSTEM

NEW YORK has made two contributions of the first importance to banking science: (1) the safety fund system, or mutual insurance of circulating notes; (2) the free bank, or bond deposit, system for securing circulating notes, which was the precursor of the national banking system.

During the first half century banking in New York was an integral part of the spoils of politics. Federalists would grant no charters to Republicans, and Republicans none to Federalists. After a few banks had been established they united, regardless of politics, to create a monopoly by preventing other persons from getting charters. When charters were applied for and refused, the applicants began business on the common-law plan. Then, at the instigation of the favored ones, the politicians passed a law to suppress all unchartered banks. The latter went to Albany and bribed the legislature. In short, politics, monopoly, and bribery constitute the key to banking in the early history of the state.

Banks and Politics.

The Bank of New York, described in a previous chapter,[1] was controlled by Federalists. As the anti-Federalists knew that the legislature would not grant a charter to them, Aaron Burr conceived the idea of procuring one by stealth. The city had recently been scourged with yellow fever, the ravages of which were attributed in part to the bad water. Accordingly a petition was presented for a charter for a

[1] See page 248.

company with a capital of $2,000,000 to supply New York City with pure water. In it was a clause authorizing the company to use any surplus of capital, over and above the amount needed for the water works, in any moneyed transactions not inconsistent with the constitution and laws of the state or of the United States. The Council of Revision (of which John Jay was president), whose approval was necessary, did not suspect that banking powers were concealed in the charter. The charter was granted, and the company applied one half of its capital to water works and the other half to the banking business. This was the Manhattan Company, which ceased to be a water company in 1840, but has continued as a bank to the present day.

The Manhattan Company.

When the Republicans came into power they refused all applications for bank charters to Federalists; and the existing banks, of which there were six in the state prior to 1804, made common cause to prevent any new ones from entering the field. In that year the Merchants' Bank of New York City, which was already in operation under the common law, applied for a charter. It was refused. The bank bought its way through the legislature amid scenes of excitement, which included fist fighting in open session. In 1811 the Bank of America repeated the operation on a larger scale. In 1821 the people of the state sought to put an end to these scandals by a clause in the constitution of that year requiring a two-thirds vote of both branches of the legislature to pass a bank charter, but the only effect was "to increase the evil by rendering necessary a more extended system of corruption."[1]

In 1828 forty bank charters were in force, out of forty-three which had been granted, three small country banks having become insolvent. The charters of thirty of the

[1] Hammond's *History of Political Parties in the State of New York.*

survivors were about to expire, and all efforts to renew them had failed to secure the necessary two-thirds vote. The legislature was determined to impose on the banks some new conditions, in the public interest. At this juncture (January 24, 1829) Mr. Joshua Forman of Syracuse addressed a letter to Martin Van Buren, governor of the state, proposing a plan for the mutual insurance of banks. His suggestion was that each bank should be required to contribute annually to a common fund for the payment of the debts of such banks as should fail, this contribution to continue till it should reach half a million dollars and be kept up to that sum by further contributions when needful.

Joshua Forman.

Mr. Forman's plan was adopted, and a law was passed providing that every bank whose charter should be granted or extended thereafter should pay into a "bank fund" one-half of 1 per cent of its capital each year, until the contributions should be equal to 3 per cent of its capital stock. This fund was to be applied solely to the payment of the debts (exclusive of the capital stock) of failed banks belonging to the system. The fund was not to be used, however, until the assets of the failed bank had been exhausted and the deficiency determined by judicial proceedings. Whenever the fund should be reduced in this way, the comptroller was to call on the banks for fresh contributions, at the same rate, as to time and amount, as the original ones. The same act provided for the appointment of three commissioners to examine all the banks three times each year, or oftener if required to do so. Any three banks might call for a special examination of any bank in the system.

Safety Fund System.

In 1837 three safety fund banks, all in the city of Buffalo, were reported to be in difficulties. The legislature passed a law authorizing the comptroller to make immediate payment,

out of the bank fund, of the notes of any insolvent bank whose liabilities, in excess of assets, should not exceed two-thirds of the amount in the bank fund. This law was applied to the three Buffalo banks. There was no depreciation of their notes, and the bank fund was restored out of the assets of the failed banks. Two other banks went into liquidation soon afterwards, and their notes were paid and the fund replenished in the same way. There were no more failures till 1840. During that and the two following years eleven banks failed. The fund was now about $900,000, of which $600,000 was applicable, under the law of 1837, to the immediate redemption of circulating notes, the remainder being reserved for depositors. The first three banks in the order of failure exhausted this sum. The bank commissioners, in their annual report for 1841, said that the bank fund was primarily intended for the protection of note holders, not depositors or general creditors. The fact that the law put all creditors on the same level was not understood by the public or by the bankers themselves, and its expediency was called in question. In 1842 the law was amended, so that after the payment of all the liabilities charged against the fund at that time the note holders should have the first lien on it.

Notes made a Prior Lien.

In the constitution of 1846 note holders were made preferred creditors of all failed banks. This valuable principle had been adopted by the state of Connecticut in 1831. The law of that state, however, gave the preference only to the holders of notes of the denomination of $100 or less. One reason why note holders ought to be preferred creditors of failed banks is that usually it is not a matter of choice whether persons shall or shall not accept bank notes offered in payment. This is especially true of the poorer and more helpless classes of

Reason for this.

the community, who are liable to lose situations, or favor, or patronage, if they make objections to the kind of money offered to them, and who are less able to form opinions for themselves on the soundness and standing of particular banks.

Unfortunately the charges against the bank fund before the act of 1842 took effect were sufficient to absorb everything it was likely to receive from the ½ per cent annual contribution for several years. Accordingly the state issued its own stock for $900,000 to make prompt payment to the creditors of the failed banks, taking a lien on the fund for repayment; and eventually the state's advances were all reimbursed out of the fund, principal and interest. Moreover, the fund redeemed about $700,000 of notes fraudulently overissued, — a consequence of the lack, in the original act, of any system of public registration. The whole amount of payments into the safety fund was $3,104,999.

Fraudulent Overissues.

The faults of the safety fund system were errors of detail. The fund should have been liable only for circulating notes. By attempting too much, the system broke down. When a bank failed the redemption of its notes from the fund should have been immediate, so that the note holders should not lose by delay and depreciation, and the fund should have been reimbursed later out of the assets of the failed banks and the legal contributions of the solvent ones. On the assumption that the circulation only ought to be protected, the contributions to the fund should have been proportioned to the circulation, and not to the capital stock, of each bank. The notes should have been issued to the banks only by the state comptroller, and duly recorded. In his report for 1848, Millard Fillmore, the comptroller, said that "the Safety Fund would have proved an ample indemnity to the bill

Faults of the System.

holder had it not been applied to the payment of other debts of the banks than those due for circulation."[1]

Although the safety fund system has passed away in the place of its birth, it is alive and in high esteem in a neighboring country. It was adopted in Canada in 1890, in order to secure the prompt redemption of the notes of failed banks, *i.e.*, to avoid a discount on the notes of such banks pending liquidation. Under the Canadian system the circulating notes are the first lien on the assets, and it is believed that the assets will always suffice to redeem the notes; but the delay in converting them into cash, prior to the establishment of the safety fund, had led to a temporary discount on such notes. The maximum amount of the fund is 5 per cent of the outstanding circulation of all the Canadian banks, and it must be kept up to this maximum, the Minister of Finance having power to call on the banks for additional contributions, when necessary, not exceeding 1 per cent in any year. When the assets of failed banks are paid in, however, refunds may be made to the contributing banks of the excess over 5 per cent. Under the Canadian law the notes of failed banks draw interest at 6 per cent until redeemed. They are therefore eagerly received by the other banks, and there has been no depreciation on any such notes since the system was adopted.

The Safety Fund in Canada.

[1] Mr. L. Carroll Root (*Sound Currency*, Vol. II, No. 5) has verified Mr. Fillmore's statement by an independent examination of the figures. "It is plain," he says, "as a result of calculation from experiments of 36 years (1829–1865), that, had the Safety Fund system — as perfected prior to and in the constitution of 1846 — been left untouched as that upon which New York State bank currency was based, not merely would every dollar of circulation have been kept good, but the total assessment to keep the fund good would have averaged less than $\frac{1}{4}$ per cent on the banking capital, or about $\frac{3}{8}$ per cent on the average circulation outstanding."

RECAPITULATION

The safety fund system of New York was a mutual insurance of banks, established by law in the year 1829, for the protection of their creditors. It required an annual contribution by all the banks in the state of a sum equal to ½ per cent of their capital, until the fund should reach 3 per cent thereof, out of which the remaining indebtedness of insolvent banks was to be paid after their assets were exhausted, — the contributions to be renewed from time to time at the same rate when necessary. The first bank failures that took place after the system was adopted occurred in 1837. A law was then passed by the legislature authorizing the immediate use of the money in the fund for the redemption of the notes of failed banks, provided the amount called for did not exceed two-thirds of the whole fund then in hand. The notes of the failed banks were redeemed immediately, and they suffered no depreciation. In 1840–42 eleven banks failed, and the consequent demands to meet the claims of both note holders and depositors were too large to be satisfied out of the money in the fund. In 1842 a law was enacted that, after the existing claims were paid, the fund should be applied only to the redemption of the circulating notes of failed banks. This change came too late to be of service; for the claims on the fund were larger than could be met out of the annual contributions for several years. In the meantime the policy of the state in reference to banks was radically changed by the constitution of 1846, which prohibited the granting or extension of any special charters for banks. As all of the safety fund banks were in this category, the system was doomed to extinction when the existing charters expired. All the claims against the fund were eventually paid in full, including the redemption of a large amount of notes fraudulently issued, and an

unclaimed balance of $13,144 was turned into the state treasury. The last charters of safety fund banks expired in 1866.

Experience under the safety fund system showed that the original act was defective in the following particulars: (1) it should have required public registration of note issues to prevent fraud; (2) note holders should have been made preferred creditors of failed banks; (3) the safety fund should have been applied only to the redemption of circulating notes; (4) the fund should have been applied to this purpose immediately upon the failure of any bank (to prevent depreciation of its notes), instead of awaiting the results of liquidation of its affairs. All of these changes were made by amendments to the law or the constitution of the state between the years 1837 and 1846. If they had been embodied in the original act, there would never have been any loss to note holders under the system, by depreciation or otherwise.

CHAPTER XI

THE FREE BANK SYSTEM

THE next change in the banking system of New York was even more radical than the one described in the preceding chapter. Until 1838 banking had remained a monopoly. Nobody could get a charter without a special act of the legislature, and nobody could invest even $100 in a new bank without the consent of the bank commissioners of the state. When a charter was granted these officials parceled out, as a matter of favoritism and partisan spoils, the rights to subscribe for shares. Contention and heart burning were the necessary consequence, and no persons were more keenly alive to the disgrace than the bank commissioners themselves, who said in their report of 1837:

The Monopoly System.

> The distribution of bank stocks created at the last session has in very few, if any, instances been productive of anything like general satisfaction. In most instances its fruits have been violent contention and bitter personal animosities, corrupting to the public mind and destructive of the peace and harmony of society.

These scandals caused nearly universal disgust and led to a revolt in the Democratic party in 1835. A faction sprang up calling themselves the Equal Rights party, known afterwards as the "Locofocos." They adopted a platform in which they declared "hostility to any and all monopolies by legislation, because they are violations of the equal rights of the people." As the Democratic party took no steps to

reform the evils complained of, the Locofocos joined the Whigs and carried the elections in the city of New York in the autumn of 1836 and the spring of 1837, as well as the state election in the autumn of the latter year, securing a large majority of the legislature. This victory led to the free banking law of 1838, the motive for it being political rather than financial. A suggestion for such a system had been made eleven years earlier by the Rev. John McVickar, professor of political economy in Columbia College, in a letter written to a gentleman in Albany and published in a pamphlet. Professor McVickar proposed that any individuals or associations might enter into the banking business freely, but that nine-tenths of their capital should be invested in government stock, of which the bank should receive the interest, though the principal should remain in the custody of the state as security for the circulating notes of the bank. The remaining tenth of the capital might, however, be invested as the officers of the bank should see fit.

Political Revolt.

The free banking law of New York was introduced in the legislature by Mr. Abijah Mann. As amended and passed, it provided that any person, or association of persons, might receive from the comptroller circulating notes, and after signing them might issue them as money by first depositing with him stocks of the United States, of the state of New York, or of any other state approved by the comptroller, made equal to a 5 per cent stock of the state of New York, or bonds and mortgages on improved, productive, and unincumbered real estate, worth double the amount of the mortgage, exclusive of the buildings thereon, and bearing interest at not less than 6 per cent per annum. The banks might deposit stocks only, or half stocks and half bonds and mortgages, and the printed notes should specify to which

Free Banking Law.

class they belonged. In case default should be made in the redemption of any such notes, the comptroller was to sell the securities and apply the proceeds to the redemption of the notes. The state was not in any way responsible for the payment of the notes beyond the proper application of the securities to that purpose. The persons or associations depositing the securities were to receive the interest on them as long as they redeemed their notes on demand, unless in the opinion of the comptroller they had depreciated so as to be no longer adequate security.

The bill became a law on April 18, 1838. There was an immediate rush of people into the banking business. One hundred and thirty-three new banks were organized, and seventy-six started in business before December 1, 1839. Experience under the new system was at first disastrous.

A Bad Beginning.

The Bank of Tonawanda failed in 1840, and its securities realized only sixty-eight cents on the dollar of its outstanding notes. This example led to a change of the law regarding stock securities, which were now restricted, as to banks subsequently established, to those of New York. The mortality of the free banks was so great, by failure or voluntary liquidation, that in 1842 only forty-six remained in operation. In 1844 the comptroller reported that twenty-six free banks had failed, and that their circulation has been redeemed at the average rate of seventy-six cents on the dollar.

The practice of issuing notes at interior towns by individuals residing in New York City, or even in other states, was soon discovered to be prevalent. Hence, a law was passed in 1840 requiring that all country banks should redeem their notes in New York City or Albany at a discount not exceeding one-half of 1 per cent. As they usually passed at par, a man could issue and lend notes in New York City, dating them at some remote place in the interior,

and then redeem them at a discount of ½ per cent at the very place where he had issued them. The profit on $10,000 would be $50 each time that amount of notes was put out and taken back, plus the interest paid by the borrower. This was more freedom in banking than had been contemplated. An act was accordingly passed in 1844, providing that nobody should transact business as a banker except at the place of his actual residence, but this law was evaded. The banker appointed a dummy in the interior town to sign the notes for him, and then went on as before. Banks established merely for the purpose of issuing notes were made the subject of examination and reproof by a committee of the senate in 1845. Three years later a law was passed requiring that all banking associations and individual bankers should be banks of deposit and discount as well as of circulation; but, as there was no means provided for enforcing it, this law was evaded also. In 1851 the legal discount on country bank notes was reduced to ¼ per cent.

Abuses of Free Banking.

It was commonly supposed that security for bank notes was the same thing as redemption of them; and that, if the notes were secured, redemption would not be demanded, or if demanded would be easily met. All of these suppositions were erroneous. Redemption of the notes was just as necessary under this system as under any other; and when the test came, the security was found to be defective. The event proved that there were other conditions requisite to a good banking system, — that the shareholders must be men of substance and character, that the banks must have capital and local habitations, and that they must do a real banking business. The defects of the securities under the free bank system were remediable, however. Experience having proved that bonds and mortgages were not quick assets and that they might become utterly unavailable in a panic,

they were finally cast out altogether, and the stock securities were toned up to par by being restricted to those of the United States and of the state of New York. The state constitution of 1846 also contained important provisions. It made stockholders individually liable (after a specified date) for the debts of banks to an amount equal to their respective shares, in addition to the amount invested by them in the bank. It provided that in case of insolvency note holders should be preferred creditors; that the legislature should not pass any law sanctioning the suspension of specie payments; that no special charters for banking purposes should be thereafter granted or extended; and that all future acts of incorporation, whether general or special, might be altered, amended, or repealed. All these provisions are traceable to the Locofoco uprising of 1836–37.

Faults of the System.

From 1839 to 1850 thirty-two free banks failed, with a circulation of $1,468,243, which was redeemed at various rates from par down to thirty cents on the dollar, the aggregate loss being $325,487. From 1851 to 1861 there were twenty-five failures, with a circulation of $1,648,000 and a loss of only $72,849. After 1861 there were no failures that resulted in loss to note holders, except by some small delay in realizing on the securities. The system was now nearly perfect, so far as security was concerned.

System perfected.

Comparison of the results of the safety fund and of the free bank systems in the state of New York shows a marked advantage for the former in the matter of elasticity of note issues, or the power to respond quickly to the varying demands of business. It was not necessary for the safety fund banks to invest additional capital, to buy securities in the market and lodge them with the state comptroller, and to go through other tedious formalities

before meeting the demand for more notes. They could respond immediately, and in exact measure with the demand. The free banks, after buying their notes from the state comptroller, could not put out any more of them than the safety fund banks could of theirs, which cost nothing, or keep them out any longer. When the notes of the free banks came back to their counters they became dead capital, earning no interest. Hence those banks would take out no more than the average amount which they could keep in circulation. Thus they would have no margin for special emergencies. Accordingly there was a regular rise and fall of the circulation of the safety fund banks according to the seasons and the state of trade, while that of the free banks was comparatively rigid.[1]

Elasticity of Note Issues.

The free bank system of New York harmonized so well with the doctrine of equal rights and gave such promise of abundance of money that it became very popular. Sixteen states adopted it in whole or in part. The controlling motive in most cases was to secure circulating notes in the largest amount and with the greatest rapidity possible. The state of Illinois passed her free banking law in 1851. In November of that year it was submitted to a vote of the people and ratified. It provided that any number of persons might organize a bank, but that no bank should have a less capital than $50,000. It did not require that a bank should have any directors. The bank's capital might consist wholly of bonds of states or the United States, deposited with the state auditor as security for its circulating notes. The auditor could deliver to the

Free Banks in Illinois.

[1] Mr. L. Carroll Root, in his monograph on *New York Bank Currency*, presents a view of the working of the two systems as regards elasticity, by charts showing the rise and fall of the circulation under each from 1857 to 1861. — *Sound Currency*, Vol. II, No. 5.

bank in circulating notes 80 per cent of the market value of the securities. The banks were allowed to pay out the notes of any specie-paying banks of the United States or of Canada. This was virtually an authorization to banks to pay their debts in something else than gold or silver and hence was unconstitutional; but, as it was in accord with public opinion, nobody questioned it. One hundred and twenty banks were established under this law. Most of them were banks of circulation only. The banking business, in their view, consisted in converting state bonds into circulating notes, getting these into the hands of the people for value, and preventing note holders from calling on them for specie. There were attempts at first to do a legitimate banking business in the large towns under this law; but they were ineffectual, because the notes of such banks would be returned for redemption, while those of remote and inaccessible places would remain in circulation. In practice it was hardly necessary for the bank to have a place of business, if its notes were secured. In some instances, where attempts were made in Illinois to present notes for redemption at the bank's counter, no counter was found, but merely a hired room in some place remote from any railway station and situated on some bottomless prairie road.

The panic of 1857 caused a suspension of specie payments over the greater part of the country, including New York and New England. With such illustrious examples before them, the closing of the banks of Illinois was looked upon as a matter of course. Exchange on New York rose to 15 per cent premium in Chicago. The country banks of Illinois had nothing except security bonds which were held by the state auditor. In many cases the bonds had been borrowed and the resulting notes had been handed over to the lenders. Nevertheless, the people were tolerant and allowed the bankers time to recuperate. In 1861, when the Civil War

began, there were 112 so-called "solvent banks" in existence in the state, meaning those that had recovered from the disasters of 1857 or had been established later. When the clouds of the war began to lower, the security bonds, many of which were those of Southern states, began to decline in value, and the notes depreciated accordingly. There was now no real money and no currency in Illinois, but merely different varieties of uncurrent notes passing at various rates of discount, the quotations varying from day to day, from place to place, and even from street to street. Lists of banks, with the rates at which their notes would be received in trade, were posted in all shops, railroad offices, and brokers' offices, and published in the newspapers. There was a merchants' list, a bankers' list, and a railroad list, and these were subject to change without notice. In August, 1861, the system collapsed. At the end of the year only seven free banks remained, with a total circulation of $147,000. The legislature was bewildered by the crumbling of the system on whose security such extravagant hopes had been built. A law was enacted providing that no bank should have a circulation exceeding three times its capital, and that the bonds deposited to secure its circulation should not be considered as evidence of capital; but the system never recovered from the shock. The circulation outstanding at the beginning of 1861 was $12,320,694. The average loss to note holders was 40 per cent. But for the advent of the Civil War it is probable that free banking in Illinois would have followed the same course as in New York, — that the securities would have been gradually toned up to par, the laws made more stringent, and central redemption required.

Final Collapse.

The free bank system was adopted in Indiana in 1852 and in Wisconsin in 1853. The law of the former state was very similar to that of Illinois. The differences were that

in Indiana the auditor might issue circulating notes to the full amount (instead of 80 per cent) of the face value of the securities deposited, and that each bank must have specie in its own vaults equal to 12½ per cent of its circulating notes, — a requirement that was not generally complied with. The downfall of the system in Indiana was even more precipitate and disastrous than in Illinois.

Indiana.

The free banking law of Wisconsin allowed the bank comptroller to issue circulating notes to the full amount of the bonds of states deposited with him by banks. It allowed him also to receive the first mortgage bonds of any railroad in the state twenty miles long, or divisional mortgage bonds on sections of road of not less than forty miles, such road to be first inspected as to its physical condition by the governor, the Attorney-General, and the bank comptroller, or any two of them. On such securities 80 per cent of circulating notes could be issued, and one-half of the securities of any bank might consist of railroad bonds of this description. Stockholders were required to give their personal bonds to the extent of one-fourth of the amount of the circulating notes, as security against depreciation of the other securities. Except in this particular the shareholders were not liable beyond the amount of their capital invested. This law was no better than those of Illinois and Indiana, but it was better administered. The comptroller was more careful about the securities he took, and as a consequence the banks were better fortified when the strain came. Yet they ended in disaster and disorder, the city of Milwaukee being the scene of riots in June, 1861, in consequence of the depreciated currency.

Wisconsin.

The free bank system was adopted permissively in Canada in 1850. There it was brought in competition with the system of chartered banks, which was then substantially the

same as that of the New England States. Only six banks were organized under it, although special advantages were offered in the way of exemption from taxation. Their circulation, which reached $1,080,684 in 1856, ran down to $495,631 in 1860, and the next year three of the six practically withdrew from the field, and now only one remains. The reason for the failure of the system was that the free banks could not compete with their neighbors and rivals in business. When the system was started, the Canadian government debentures paid 6 per cent interest and could be bought at a price which netted 7 per cent to the investor. The advocates of the system said that this would furnish an ample margin of profit, — that the banks would get 7 per cent on their deposited bonds, plus whatever they could obtain from the loan of their circulating notes. This was a half truth. The fact was overlooked that the other banks, having their capital free (not locked up in government debentures), could lend three or four dollars of credit for every dollar of cash in hand and could use their circulating notes as well as the free banks could use theirs. Thus the business opportunities were in favor of the chartered banks. A similar competition, with similar results, took place between free, or bond-deposit, banks and chartered banks in Massachusetts, Ohio, and Louisiana. The former were crowded out.

Free Banking in Canada.

RECAPITULATION

Until the year 1838 nobody could engage in the business of banking in the state of New York without a special charter. Thus had grown up a bank monopoly which had been the cause of political corruption and bribery of the legislature. These abuses led to a popular reaction and to the passage of a law enabling any person, or association of

persons, to engage in the business of banking on condition of securing their circulating notes by the pledge of public stocks, or of such stocks and bonds and mortgages together, to be lodged in the hands of the comptroller of the state. In case of the failure of any bank the comptroller was required to sell the securities and apply the proceeds to the redemption of the notes.

The first bank failure under this system took place in 1840. Its securities realized only sixty-eight cents on the dollar of its outstanding notes. Twenty-six free banks failed between the years 1839 and 1844, and their notes were redeemed at the average rate of only seventy-six cents on the dollar. These results proved, not that the system was bad, but that it was defective in details. Then the law was amended, so that only the stocks of the United States and of the state of New York should be accepted as security for the note issues of the free banks, while bonds and mortgages were excluded altogether. After these amendments had been made the notes of banks which became insolvent were redeemed at par.

In several of the states which followed the example of New York the free bank system proved a disastrous failure, in consequence of the badness of the securities authorized to be taken. Before these states had time to perfect the system the Civil War began and the national bank act soon afterward superseded all other systems.

Authorities for Chapters X and XI

Knox's *History of Banking in the United States.*

Root's *New York Bank Currency* (*Sound Currency*, Vol. II, No. 5).

Hammond's *History of Political Parties in the State of New York.*

Breckenridge's *Canadian Banking System.*

Reports of the Bank Comptroller of New York.

CHAPTER XII

CHAOS OF BANKING IN THE XIX CENTURY

THE orderly conditions of banking at the beginning of the twentieth century cannot be fully appreciated without a glance at the chaos which prevailed during the greater part of the nineteenth. Some of the disorders have been detailed in preceding chapters, but they give a very inadequate idea of the miseries endured by the people before the second Bank of the United States was established and for some thirty years after it ceased to exist.

The usual method of starting a bank was as follows: First, a charter was obtained from the state legislature. This would form the basis of a speculation. It was customary to subscribe for a much larger number of shares than one expected to get. One bank is said to have had an authorized capital of $100,000, whereas the subscriptions amounted to $8,000,000. In Philadelphia the struggle at the windows of the offices where subscriptions were taken was often attended with severe personal injury. "The most disgraceful riots that occur in Philadelphia," says Gouge, "are those which are produced by the opening of the books of subscription for a new bank." If the competition had been very brisk, the shares would generally command a premium after the books were closed. This was the chief aim of the speculators. Then the capital would be paid mostly in stock notes. The interest on the stock notes would be offset by the dividends on the shares, with a surplus to the speculators, provided the

Speculation in Bank Charters.

bank did not break. If the times happened to be unpropitious and a suspension of specie payments followed, the state legislatures were lenient, the banking fraternity was powerful, and public opinion was so lifeless that the business might go on just as well as before, or even better, since there would then be no restraint upon the bank's issues. As the activities of banking at that time took the form of note issues rather than of deposits, the losses resulting from bank failures were widely diffused. They fell upon the whole community, but especially upon farmers, mechanics, wage-earners, washerwomen, and other poor people, who did not have bank accounts, but into whose pockets the worthless notes had found their way.

There were general suspensions of specie payments in 1814, 1818, 1837, 1841, and 1857, besides the suspension of the Civil War period, — 1861–79. There were some crises in which the banks which continued to pay specie were exceptions to the general rule. There were also many partial suspensions, where large groups, although not a majority, of banks failed; and there were individual suspensions without number, many of them fraudulent, and all entailing indescribable suffering on the poorer classes. Such misery was inflicted upon the country that some of the states in their constitutions entirely prohibited the existence of banks within their limits.[1] Most

Bank Failures.

[1] The writings of W. M. Gouge and Condy Raguet, like the pages of Niles' *Register*, are filled with particular instances of downright fraud, and of reckless speculation which can hardly be distinguished from fraud, in the establishment, operation, and closing of banks in the first half of the nineteenth century. For example: the Towanda Bank of Pennsylvania established its credit and gained a large circulation by having an agent to redeem its notes in Philadelphia. Suddenly the agent stopped redeeming them. "Hundreds of poor laborers," said the *Public Ledger*, "were to be seen running in every direction with their hands full of the trash and not able to induce a broker to give a sixpence

commonly, however, the banking fraternity controlled the state governments.

A report made to the legislature of North Carolina in 1828 disclosed the following facts. The bank of Cape Fear and the bank of Newbern were chartered in 1804. The nominal capital of each was $800,000. In each case the law required that this should be paid in gold or silver, but it was not so paid. Upon this fraudulent basis they issued notes to the amount of more than $3,000,000, which they issued for discounting paper, drawing 6 per cent interest, "so that," says the report, "for the use of their notes, which, intrinsically, were of no value at all, the stockholders of these two banks have drawn from the people by way of interest something like $200,000 annually." The state bank of North Carolina was incorporated in 1810 with a capital of $1,600,000. In 1819 these three banks entered into an agreement with each other not to pay specie, and their circulating notes immediately fell to 15 per cent discount. They then introduced a clause into the promissory notes which they discounted, requiring payment in specie; that is, they lent their own irredeemable notes to the public on condition that payment should be made in coin. The specie so received was used to buy up their own circulating notes at a discount. At the time when the investigation was made the state bank had less than $1000 specie in its vaults. In view of these shocking revelations the recommendation of the legislative committee was that the Attorney-General should be directed to institute proceedings for forfeiture of charter. Even that suggestion failed; for, when the banks

Chaos in North Carolina.

on the dollar for them. We passed in the market a woman who makes her living by selling butter, eggs, and vegetables, who had almost all she was worth, about $17, in Towanda bank notes. When apprized that it was worthless, she sank down in agony upon her stool and wept like a child."

threatened to call in their loans, the legislature immediately became deaf and the people dumb.

The state of Georgia in 1818 gave to the bank of Darien a charter, which provided that in every case where a demand was made on the bank for the redemption of its notes in specie the cashier might require the person making the demand to take an oath in writing "that such notes or bills so presented for payment are not the property of any other bank, company, or incorporation." The bank enlarged this privilege by adopting a rule that every person presenting its notes for redemption must take an oath in the bank, before a justice of the peace and in the presence of five directors and the cashier, that he was the owner of the notes and was not acting as the agent of anybody else. Of course, if it was very inconvenient for the bank to pay, it could thus protect itself; for it would be very difficult for the other party to bring a justice of the peace, five directors, and the cashier together. In other words, the bank assumed power to suspend and resume payments at its own pleasure.

In Georgia.

The exercise of this power as against strangers was favored by public opinion, not only in Georgia, but throughout the South and West. Anybody coming from a distance to draw specie from a bank incurred the odium of the community. In such cases the bank was considered justified in paying the most inconvenient kind of coin and in taking the longest time to count it. In some cases persons who claimed their rights against banks in this way were threatened with tar and feathers. Public authority over banks was equally paralyzed.[1]

[1] "We search almost in vain through the law reports for any decisions on the rights or authority of the state over banks, or the duties of banks to the state. It may be said that no attempts were made to test or enforce the rights of the state against banks and that, as a matter of

A number of chartered banks existed in Michigan in 1837 Early in that year she passed a banking law which, in some of its features, anticipated the free bank act of New York. It provided that any number of freeholders, not less than twelve, might organize themselves as a bank and open books of subscription to the capital stock thereof, 10 per cent to be paid in specie at the time of subscribing, and not less than 30 per cent before commencing business. The banks were required also to deposit security with the auditor-general of the state for their circulating notes and other liabilities. The securities might be bonds and mortgages or the personal bonds of resident freeholders, to be approved by the treasurer and clerk of the county, and they were to be held for the debts of the banks in case the other assets should prove inadequate. In the following December another act was passed providing for the appointment of three commissioners to visit and inspect all the banks every three months and especially to examine their specie. This act also made a change in the system of deposited securities, by providing that they should consist of bonds and mortgages only.

In Michigan.

The commissioners started on their journey in January, 1838. They found that the state had been plentifully littered with banks, but that the basis for most of them was one lot of specie, which was used in each case until the formalities of the law were complied with and then passed on to the next. In other cases no specie had been seen at any time, but incantations had been held with imaginary

practice, it had none. The banks were almost irresponsible. Such decisions as bear at all on the authority of the state over banks proceed from the attempts of the banks to resist the exercise of any authority whatever. For instance, the banks which had charters resisted the appointment of Bank Commissioners, which was an exercise of visitorial power, and was the lever by which the state, after 1840, began to reduce the banks to order." — SUMNER'S *Banking*, p. 352.

gold in the form of specie certificates and specie checks. The commissioners learned that a watch was kept on their movements and that when they were expected to visit a certain bank the requisite amount of specie would be sent ahead one day or one night, so that it might be inspected and then withdrawn for the use of the next bank. But, as the specie in circulation at that time was mostly of foreign origin, after a particular lot had been inspected two or three times it could be identified by the preponderance of coins of this or that country, or by special marks on some of them. In this way the commissioners easily discovered the deception. Yet in every case somebody was found to swear that the specie belonged to the bank and that it was intended to be kept there for the sole business of that bank. Many of these institutions were located in the depths of forests where there were few human habitations, but plenty of wild cats. Thus they came to be known as the "wild-cat banks." Forty of these so-called banks went into operation under the law of 1837, with a nominal capital of $3,900,000, and all but four of them failed before December, 1839. The failure of the free banks discredited the chartered banks also and brought all of them down except three. The people of the state, who did not then number above 100,000 and were very poor, were left with $1,000,000 of worthless bank notes in their hands, for which they had given their products and their labor. When an attempt was made to realize on the mortgage securities, the Supreme Court pronounced the free banking act unconstitutional and void.[1]

"Wild-Cat Banks."

The bewildering state of the paper currency before the Civil War may be learned from the numerous bank-note Reporters and counterfeit detectors of the period. It was the aim of these publications to give early information to

[1] Felch's *Early Banks and Banking in Michigan.*

enable the public to avoid spurious and worthless notes in circulation. These were of various kinds: (1) ordinary counterfeits; (2) genuine notes altered from lower denominations to higher ones; (3) genuine notes of failed banks altered to the names of solvent banks; (4) genuine notes of solvent banks with forged signatures; (5) spurious notes, such as those of banks that had no existence; (6) spurious notes of good banks, as 20's of a bank that never issued 20's; (7) notes of old, closed banks still in circulation.

Counterfeit and Spurious Notes.

The number of counterfeit and spurious notes was quite appalling, and disputes between payer and payee as to the goodness of notes were of frequent occurrence, ranging over the whole gamut of doubts, — as to whether the issuing bank was sound or unsound, whether the note was genuine or counterfeit, and, if sound and genuine, whether the discount was within reasonable limits. All merchants kept "bank-note Reporters" for ready reference. If there was a bank in the town, the cashier was appealed to constantly by citizens to pass upon the goodness of notes in circulation.

Bicknall's Counterfeit Detector and Bank-Note List of January 1, 1839, contained the names of fifty-four banks that had failed at different times; of twenty fictitious banks, the pretended notes of which were in circulation; of forty-three other banks, for the notes of which there was no sale; of two hundred and fifty-four banks, the notes of which had been counterfeited or altered; and enumerated thirteen hundred and ninety-five descriptions of counterfeited or altered notes then supposed to be in circulation, of denominations from one dollar to five hundred.

Counterfeit Detectors.

Twenty years later *Nicholas' Bank-Note Reporter* had fifty-four hundred separate descriptions of counterfeit, altered, and spurious notes. The number of this *Reporter* for November,

1858, described thirty different counterfeits of the notes of the Bank of Delaware, Wilmington. They were one 1, three 2's, twelve 5's, seven 10's, four 20's, two 50's, and one 100. The known counterfeits of the Bank of Kentucky, Louisville, were three 1's, two 2's, two 3's, one 4, two 5's, four 10's, seven 20's, four 50's, two 100's, and one 500, — twenty-eight in all. The same number were catalogued of the State Bank of Ohio, namely, four 1's, five 2's, two 3's, four 5's, nine 10's, two 20's, one 50, and one 100, with the remark appended to the last: "Bank never issued any." Descriptions of the latest counterfeits were inserted conspicuously on the first page of each number. Thus the first page of *Thompson's Reporter* for June 11, 1857, had warnings against fourteen spurious and altered notes which had made their appearance since its last issue. Extra sheets of the same publication in 1859 had notices like the following:

1's, 2's, 3's and 5's of the Wisconsin Miner's Bank are in circulation; there is no such bank.

Notes of the broken Farmer's Bank of Rhode Island are appearing altered to the other Farmer's Banks in various cities and States.

Counterfeiters have become possessed of a large batch of the worthless notes of a concern called the Thames Bank, Laurel, Ind., and have commenced altering them to represent bills of various good banks — the Thames Bank of Norwich, Conn., and the Conway Bank, Mass., and others.

Bank of Mobile. Genuine impressions of the 20's, 50's and 100's of this bank with forged signatures are in circulation.

There was a publication called *Monroe's Descriptive List of Genuine Bank Notes.* This contained thirteen hundred and twenty-three separate descriptions of notes. Frequently the banks which found their notes successfully counterfeited would destroy the plates and get new ones engraved, with the result that they had two or three kinds of genuine notes

in circulation at once, thus, of course, adding much to the confusion. There was also a list of broken, closed, and worthless banks. This was kept standing in all the Reporters. There were forty such credited to New York City at one time and one hundred and twenty-five more to other parts of the state. Rates of discount on all bank notes that were not at par in New York were quoted in all the Reporters. The auditor of Illinois advertised November 9, 1861, that he would redeem the notes of one hundred and thirty-nine banks named by him, at various rates ranging from 40 to 90 cents per dollar.

Among the minor abuses of banking was the practice of requiring borrowers to leave on deposit a certain proportion of the amount borrowed, — in some cases 40 per cent, — so that the bank could lend the difference to somebody else and thus get double interest. The practice of issuing post notes, payable thirty or sixty days after date, — this feature being, in some cases, printed in very small letters so that an ordinary observer would not notice it, — has been previously referred to. Laws were enacted forbidding the issue of post notes; but they were evaded by the device of lending notes on condition that they should be put in circulation at a certain distance from the bank, or should be kept out a certain length of time, or should be used only as collateral security for loans at other banks. One of the most common practices was to pay out the notes of distant banks that were at a discount. This practice prevailed largely in Chicago and the surrounding country from 1854 to 1859. Most of the bankers in that city owned banks in the state of Georgia, the notes of which they paid out for the commercial paper which they discounted. The same banks sold drafts on New York at $\frac{3}{4}$ per cent premium in exchange for these notes; in other words, they paid out the notes at par and redeemed them at a discount.

Minor Abuses.

This practice was sanctioned by law and public opinion, and it turned out that these unsecured notes of banks in a distant and then rather inaccessible state were intrinsically better than the bond-secured issues of the banks of Illinois. The former had assets without securities, and the latter had securities without assets. None of the Georgia-Chicago banks failed, nor did the discount on their notes ever exceed 1 per cent. The condition was similar to that which existed in New England before the corrective measures of the Suffolk Bank system were applied.

RECAPITULATION

Grave disorders in banking prevailed in the United States during the larger part of the nineteenth century. They were due to the lack of public regulation, to the want of any uniform system applicable to all parts of the country, and to the significant fact that public opinion was both torpid and unintelligent. The first and second Banks of the United States had been overthrown and nothing had been substituted which could be applied to the entire nation. Their place was filled by multifarious banks, under heterogeneous special charters and systems, of which sharpers took advantage to plunder the unwary. The lack of public regulation led to innumerable frauds and miscalculations. Want of uniformity opened the door to thousands of counterfeit and spurious notes, by means of which many people lost their earnings.

An active and intelligent public opinion is indispensable to keep banks, as well as other institutions, in good order; and for this there is no possible substitute. It is not sufficient that the banking laws be good. They must, above all, be promptly and inexorably enforced, and this cannot happen unless public opinion is well instructed and alert.

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CHAPTER XIII

SOME NOTABLE BANKS

NOTWITHSTANDING the disorders of banking in the West and South described in the preceding chapter, there were some bright spots in the prevailing gloom. The most notable of these was supplied by the State Bank of Indiana. This was a system, or group, of banks modeled, for the most part, upon the Bank of the United States. It was established by the state legislature in 1834, after the bill to recharter the Bank of the United States had been vetoed by President Jackson. The capital of the bank was $1,600,000, all of which was paid in specie — mostly in Spanish and Mexican silver dollars. One-half of the capital was owned by the state and the other half by private individuals; but the state advanced 62½ per cent of the private subscriptions as a loan at 6 per cent interest, taking mortgage security and a lien on the shares for repayment. The persons subscribing for shares were required to pay 37½ per cent of their subscriptions in specie before the state advanced the remainder. The state procured the money by a 5 per cent loan negotiated in New York. The securities issued were termed "bank bonds." These were to run a little longer than the charter of the bank and were specially secured by the state's shares in the bank and her lien on those of the private shareholders. The charter was to continue twenty-five years, and no other banking corporation was to be created or permitted in the state during that time.

State Bank of Indiana.

The bank was to consist of one parent institution at Indianapolis and ten branches. Each branch had a capital of $160,000. The parent institution had no capital under its immediate control, differing in this respect from the Bank of the United States. It consisted of a president and board of directors who supervised, examined, and controlled the whole. The president and four directors were chosen by the legislature to hold office five years, and one director was chosen by the private shareholders of each branch. The branches were managed by the local shareholders, subject to the central board at Indianapolis. The number of branches was afterwards increased to thirteen by additional capital, of which the state contributed one-half. The earnings of each branch belonged to its own shareholders exclusively, but the dividends were declared only by the parent bank. Unpaid interest on loans, whether due or not due, could not be included in dividends. Each branch was liable for the debts of every other branch, and in case of the insolvency of a branch had to pay them within one year; but the state had a first lien on the assets of any failed branch for the reimbursement of its stock. The branches were independent of each other as to assets, but were united as to liabilities. This had the effect of inducing vigilance on the part of all the members in watching each other and of inspiring public confidence in the stability of the whole institution.

Its Branch System.

No branch could lend money on the security of its own stock. No officers or directors could borrow on terms unlike those offered to the public, or indorse for each other, or vote on questions wherein they were financially interested. On all applications for loans above $500, a majority vote of five-sevenths of the board was necessary, and this was to be entered on the minutes with the names of the directors so voting. Directors

Charter Regulations.

were individually liable for losses resulting from infraction of the law, unless they had voted against such infraction. The insolvency of any branch was to be deemed fraudulent unless the contrary were proved. In any case of insolvency adjudged to be fraudulent the directors were to be liable for the debts without limit; and after their estates were exhausted the other stockholders were to be liable for an amount equal to their shares, in addition to the amount that had been paid, or ought to have been paid, thereon.[1] The debts due to or from any branch (except for deposits) were not to be more than double the capital of that branch. Theoretically, therefore, each branch might have notes outstanding to double the amount of its capital. Its maximum circulation was $4,000,000 (in 1851), the capital being then $2,000,000. The notes were signed by the president of the bank and were issued to the branches by the parent bank. Each branch was required to redeem its own notes in specie on demand and to receive the notes of all the other branches at par. The notes were usually taken from the parent bank by the presidents or directors of the branches traveling on horseback. Mr. Hugh McCulloch (afterwards Secretary of the Treasury) was president of the Fort Wayne branch. He says:

Circulating Notes.

Fort Wayne was three good days' ride from Indianapolis, mostly through the woods. For fifteen years I made this journey on horseback and alone with thousands of dollars in my saddle bags, without the slightest fear of being robbed. I was well known upon the road and it was well known that I had money with me and a good deal of it, and yet I rode unharmed through

[1] The clause of our national bank act which makes the shareholders personally liable for all the debts of a bank to an amount equal to the par value of their shares, in addition to the amount invested by them in the bank, made its first appearance on this continent in the charter of the Gore Bank of Hamilton, Canada, in 1835. The provision in the charter of the State Bank of Indiana fell somewhat short of that.

the woods and stopped for the night at the taverns and cabins on the way, in perfect safety.[1]

Such were the leading features of this renowned bank. Its success was due to the excellence of the rules adopted for its government and to the sagacity and fidelity of its management. It was always under the control of men of prudence and probity. The managers of the parent bank were empowered to examine the branches as often as they saw fit and were required to do so at least twice each year. The examinations were usually made by the president. They were always thorough; and, as no notice was given of the time when the examiner would come, no special preparations could be made. Mr. McCulloch ascribed the success of the bank largely to the intelligence, thoroughness, and frequency of the examinations.

The System of Examinations.

The bank's charter expired in 1859, and it went into liquidation. The state of Indiana realized a net profit of $3,500,000 — over and above the interest paid on the bank bonds — from the bank during the twenty-five years of its existence. The private shareholders, on the average, received $153.70 for each $100 paid in, besides the annual dividends. While the process of liquidation was going on, a bill was passed by the legislature to incorporate the Bank of the State of Indiana. This act was procured by certain scheming politicians, for the purpose of selling their rights under it to the owners of the expiring bank. In this they were successful. The old bank stepped into the new charter and entered upon a fresh career of prosperity, under the presidency of Mr. McCulloch; but the state had no share in it. It continued until 1865, when the federal tax of 10 per cent on the notes of state banks crippled its operations.

Final Liquidation.

[1] McCulloch's *Men and Measures of Half a Century*

Considered as a continuous institution from 1834 to 1866, this was a memorable bank, of whose history the country may well be proud. It was another excellent illustration of the "banking principle."[1] Its loans and discounts took the form of note issues, rather than of deposits, in the proportion of about seven of the former to one of the latter. This was due to the nature of its environment, as it was situated in a sparsely settled agricultural country, where bank checks were not adapted to the conditions of society. For a circulating medium bank notes were better adapted to the wants of the people than specie. Such a medium was supplied by the bank at all seasons of the year and in exact proportion to the demand — that is, in proportion to the offering of good paper for discount.[2] After 1842 the notes of the bank were always redeemed in specie, even during the crisis of 1857, when all the banks in New England, and all in New York except one (the Chemical), were obliged to close their doors. It is true that public opinion in the West did not then require the payment of deposits in specie. If a bank redeemed its notes in coin, it might pay its depositors the same kind of currency that it

Crisis of 1857.

[1] See page 297.

[2] "It is of course true that for more than thirty years the entire tendency of banking movements in the United States was toward making the notes a preferred claim against the assets, and moreover against a certain portion of the assets, set apart in a particular form for the purpose of securing the notes. It goes without saying that the national banking system, the culmination of that movement, furnishes the country with the most reliable banknote circulation it has ever had. No one, of course, would think of returning to the chaos that prevailed when each State had its own system. Yet it is by no means certain that the national banking system can be made permanent on the present basis of bond security. If, then, it becomes necessary to reorganize the system, it will be worth while to examine the merits of this Indiana system of federal banks." — HARDING'S Essay on the State Bank of Indiana, *Sound Currency*, Vol. V, No. 16.

habitually received from them; but the deposits of the State Bank of Indiana were so small a part of its liabilities that it could have met that test also.

When the bank began its operations in 1834, the state had about one million inhabitants; and of these less than one thousand were engaged in mercantile pursuits, and a still smaller number in manufactures. Accordingly, the demands upon the bank were chiefly for mortgage loans. Such loans were made in considerable amounts, and they proved embarrassing. When the troubles of 1837 came the bank could not realize on its mortgage securities. Its officers thus learned by their own experience that loans on land security, although generally safe in the long run, were not suitable for a bank whose liabilities were payable on demand. It accordingly discontinued them as soon as practicable. It continued, however, to lend money largely to farmers and drovers on personal security and on bills of exchange drawn against shipments of agricultural products. Here it found its true source of wealth, and here the agriculturists found an ever present help in time of need, in the harvesting and disposing of their crops.

Mortgage Loans.

About the time that the State Bank of Indiana was started a Scottish youth named George Smith, twenty-five years of age, found his way to this country. A native of Aberdeenshire, he came hither to seek his fortune, and he found it in due time. He arrived at Chicago in 1834 and invested his small means in the purchase of real estate there. Then he returned to Scotland, where he persuaded certain friends, among whom was Alexander Mitchell, to join him in the northwestern part of the United States. In 1838 Smith conceived the idea of establishing a bank. This, however, was not easy, for the western states and territories were at that time intensely prejudiced against

George Smith.

banks. Smith knew that he could not obtain a charter directly, but thought that he might do so covertly. The legislature of Illinois had recently granted a charter for an institution called the Chicago Marine and Fire Insurance Company. Smith took a copy of this instrument to Wisconsin and prevailed upon the territorial legislature to pass a similar one, which became law on February 28, 1839. This was a charter for a joint stock company to transact the business of marine, fire, and life insurance. It excluded "banking privileges" in express terms from the powers of the corporators, but it authorized them to receive money on deposit and to loan the same on satisfactory security. As the phrase "banking privileges" meant the right to issue circulating notes, this was prohibited. Nevertheless, Smith and his associates began to issue certificates of deposit, in the similitude of bank notes, payable to bearer. These certificates were in denominations of $1.00, $3.00, $5.00, and $10, and were generally known as "George Smith's money." They were at first redeemed in specie at Milwaukee; but as the business grew, Smith established agencies at Chicago, Detroit, Buffalo, Galena, and St. Louis, where New York drafts were given for them at the current rate of exchange. The paid-up capital of the company was $225,000, all of which came from Scotland.

The Wisconsin Marine and Fire Insurance Co.

As the legislature had never intended to grant a charter for a bank, it had enacted no regulations for one. Smith and Mitchell were therefore "wild catting" in the most barefaced manner and the legislature was obliged to take notice of this fact. At the session of 1843 a committee was appointed to investigate the company. Its finances were found to be in a sound condition; yet, since it had issued certificates of deposit in a form not contemplated by law, the committee recommended

Efforts to suppress Smith.

that the charter be repealed. This recommendation was not adopted then, but three years later the legislature did repeal the charter by a decisive vote. The company contended that the question of a forfeiture of its rights must be determined judicially, and it published a notice that in the meantime it would continue its business and redeem its certificates in the usual manner at the head office and at the established agencies. The legislature took no further steps, being restrained perhaps by the belief that, although the business transacted by the company was irregular, it was beneficial to the infant community and that a sudden termination of it might prove disastrous. So the Wisconsin Marine and Fire Insurance Company's bank continued to exist. Its circulation under the charter of 1839 reached the sum of $1,470,235. There were repeated runs on it for specie, but they were always successfully met.[1]

This institution supplies a fresh illustration of the "banking principle." Smith discounted the promissory note of Mr. A, a wheat buyer, for say $10,000, by writing that sum, minus the interest for ninety days, opposite A's name in the bank's ledger and making a corresponding entry in A's pass book. That became A's deposit and the bank's liability. The act of writing was *ipso facto* the issuance of the bank's credit. It was immaterial whether A exercised his right by drawing his checks and handing them to various people or by taking the whole amount in circulating notes, but he took notes

"George Smith's Money."

[1] "During this fruitful period (1850 to 1860) of immigration, settlement, rapid growth and marvelous development of the resources of this great commonwealth, the Wisconsin Marine and Fire Insurance Company was able, in spite of a dubious charter and hostile legislation, to supply all the channels of money circulation in the Northwest and in the valley of the Mississippi, with a constantly increasing stream of currency, the integrity of which remained to the last absolutely unquestioned." — HADDEN'S *History of State Banks of Wisconsin.*

because the people from whom he bought wheat could not use bank checks. He disbursed them among farmers, who paid them to country storekeepers, to farm laborers, teamsters, school teachers, clergymen, doctors, etc. By and by they reached the hands of the city merchant, who wished to make remittances to New York or Boston. He took the notes to Smith and obtained drafts on those cities at the current rate of exchange. It was no advantage for him to draw gold for the notes, because he could not send it to the East as cheaply as he could buy Smith's drafts. The wheat buyer, meanwhile, had shipped his grain to a consignee in New York, taking a bill of lading from a steamboat. He had made a draft on the consignee, had attached the bill of lading to it, and sold it to Smith, thus paying his indebtedness to the bank and having something left over for his own profit. This draft had enabled Smith to have funds in New York to pay the drafts which he sold to the merchants.

The farmers would have received gold for their wheat, if they had not taken Smith's notes ; but they would have been obliged to wait till the wheat could be sent to the eastern market and the proceeds returned, or else to secure advances of money from somebody who would wait for repayment till the crop had been sold. Thus, while Smith's profits were large, he did not alone reap the advantages of a paper medium of exchange, which was sound in fact, although unsound in principle. It was sound in fact because Smith and Mitchell were good bankers. It was unsound in principle because it was not accompanied by safeguards to protect the community against the doings of less honorable and less prudent men.

"George Smith's money" was an elastic currency. There was no limit to his issues, except his ability to redeem them, of which he was the sole judge. Within this limit he discounted all the paper that he considered good. He gave his own paper payable on demand for that of merchants payable

at a fixed time. His own paper passed from hand to hand and might stay out a whole year. In the fall, when the crops began to move, there was no lack of money for legitimate trade, because it was as easy to put out these certificates at one time as at another. In the winter, when lake navigation was closed, the certificates answered all the purposes of a local circulating medium. In the spring, when steamboats began to move on the Great Lakes, bringing new settlers and cargoes of goods, the certificates came back to headquarters mainly for the purchase of New York drafts, after which they took their usual round again.

The "Raison d'être."

In 1853 the state of Wisconsin passed a law requiring all banks to deposit security with the state comptroller for their circulating notes. As this kind of banking did not suit Smith, he sold his interest in the Wisconsin Marine and Fire Insurance Company and established at Chicago an institution called the Bank of America. He then bought two banks in Georgia, the notes of which he paid out at the Bank of America by discounting commercial paper. These notes he redeemed by giving drafts on New York for them at $\frac{3}{4}$ per cent premium. This was a strictly legal operation and a profitable one. The people had confidence in Smith, and the business prospered until the approach of the Civil War admonished him to abandon his connection with Georgia. He then retired to his native land and, when he died in London in the year 1900, he left one of the most colossal fortunes in the United Kingdom. The Wisconsin Marine and Fire Insurance Company became a free bank under the state law of 1853, and is now a national bank.

Smith's Retirement.

The state of Louisiana in 1842 passed a general banking law which was fit to be a model for other states. Its principal features were: (1) the specie reserve was to be equal

to one-third of all liabilities to the public; (2) the other two-thirds of the liabilities were to be represented by commercial paper having not more than ninety days to run; (3) all commercial paper to be paid at maturity, and if not paid, or if an extension were asked for, the account of the party to be closed and his name sent to the other banks as a delinquent; (4) all banks to be examined by a board of state officers quarterly or oftener; (5) bank directors to be individually liable for all loans or investments made in violation of the law, unless they could show that they had voted against the same, if present; (6) no bank to have less than fifty shareholders, having at least thirty shares each; (7) any director going out of the state for more than thirty days, or absenting himself from five successive meetings of the board, to be deemed to have resigned and this vacancy to be filled at once; (8) no bank to pay out any notes but its own; (9) all banks to pay their balances to each other in specie every Saturday, under penalty of being immediately put in liquidation. This was the first law passed by any state requiring a definite percentage of specie reserve against deposits, and the proportion was larger than is now considered necessary. Under this law Louisiana became in 1860 the fourth state of the Union in point of banking capital and the second in point of specie holdings. It is a matter of history that the Louisiana Bank Act of 1842 was strictly and intelligently enforced until the city of New Orleans was captured during the Civil War, twenty years later.

Louisiana Bank Act of 1842.

The State Bank of Ohio (established in 1845), like the State Bank of Indiana, was composed of branch banks under a central board of control. The law of 1845 provided that any number of banks not less than seven, then existing or to be organized thereafter, might become branches of the State Bank of Ohio. It started with a capital of $3,300,000.

Note issuing was to be proportioned to capital, in the following manner: any branch might issue $200,000 of notes for the first $100,000 of capital, $150,000 for the second $100,000 of capital, and so on. In this way a bank of $500,000 capital might issue $650,000 of notes. Each branch was required to deposit with the board of control 10 per cent of the amount of its circulating notes, either in specie or in bonds of the state of Ohio or of the United States, as a safety fund for the protection of the holders of notes of all the branches. The board of control might invest any money belonging to the safety fund in the bonds of Ohio or of the United States, or in mortgage on real estate in the county where the branch was situated, worth double the amount of the loan, exclusive of buildings or other destructible property. The interest on the invested fund was paid to the branch making the deposit. Each branch was liable for the circulating notes, but not for the general debts, of the other branches. In case of the failure of any branch to redeem its notes, the board of control was to make an assessment pro rata on the other branches and reimburse them as soon as the assets in the safety fund could be disposed of; and then the safety fund was to be reimbursed out of the assets of the failed branch before any other creditors were paid. The State Bank of Ohio had thirty-six branches and was highly successful. Its charter expired in 1866.

RECAPITULATION

In the State Bank of Indiana (1834–66) we observe in a primitive community the working of sound rules of banking under good administration. One-half of this bank was owned by the state and the other half by private citizens. It consisted of: (1) a president and a central board of directors, whose powers were those of general supervision

and regulation only; and (2) a number of banks in different parts of the state, termed branches of the state bank. The members of the central board had nothing to do with the investment of funds; consequently they were not exposed to the temptation of making loans to themselves or to favorites, in contravention of good business principles. The capital and profits of each branch belonged to its own shareholders exclusively, but each branch was liable for the debts of every other branch. The branches thus had a motive for keeping a watch upon each other. In case of the insolvency of a branch by reason of fraud in the management, the directors of that branch were personally liable for the debts. This rule was prescribed in order to insure vigilance on the part of the directors in keeping watch upon the administrative officers. The central board was required to examine the affairs of each branch in detail, at least twice each year. These examinations were made without previous notice and with the utmost thoroughness, usually by the president in person. Each branch was allowed to have circulating notes outstanding equal to twice its capital; but the notes were issued to them only by the central board, and, as the central board could not issue any notes to the public, the danger of overissues was practically nil. The bank was very successful; for no branch ever became insolvent and it maintained specie payments during the financial crisis of 1857. The state of Indiana reaped a large pecuniary profit from it.

The Wisconsin Marine and Fire Insurance Company was chartered by the territorial legislature of Wisconsin in 1839, at the instance of a Scotchman named George Smith, who became its president. Under the terms of the charter he established a bank, although banking privileges had been excluded from the powers granted to the incorporators. The company issued certificates of deposit in the similitude of bank notes, and by prudent management secured for them

a general credit and acceptance in all the states and territories north and west of Indiana. The company became the most important financial institution in that region and for a long time was the only one whose notes enjoyed a general circulation there. The illegal character of the business transacted by the company attracted the attention of the territorial legislature, which, in 1845, repealed its charter, but did not direct the Attorney-General to bring suit against it for forfeiture. It accordingly continued its business without interruption and its circulation eventually reached nearly $1,500,000. Its notes were always redeemed in specie at its head office in Milwaukee and in drafts on New York, at the current rate of exchange, at its agencies in Chicago, St. Louis, Galena, Detroit and Buffalo. Notwithstanding the taint of illegality, its career was honorable and useful to the community, as well as the source of large profits to its founders. The Wisconsin Marine and Fire Insurance Company's Bank still exists at the place of its birth.

The banks of Louisiana, established under a law of that state passed in 1842, were among the soundest institutions in the country or in the world. Their strength was due to the excellent rules enacted for their guidance and to the strict enforcement of the same by public officials, who were required to examine their affairs at least once every three months. This law was the first one enacted in America requiring banks to keep a cash reserve in a definite proportion to their deposits and circulation.

The State Bank of Ohio (1845–66) was composed of a central board of control, similar to that of the State Bank of Indiana, and of branch banks (eventually thirty-six in number), each of which was liable for the note issues, but not for the general debts, of all the others. Each branch was required to make a deposit with the board of control equal to 10 per cent of its circulation, either in money or in bonds

of the state or of the United States, as a safety fund for the security of the notes of all the branches. Each was entitled to the interest derived from its share of the safety fund. The State Bank of Ohio was always solvent and successful.

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CHAPTER XIV

THE NATIONAL BANK SYSTEM

THE national bank act was a product of the Civil War. In 1861 Mr. Chase, the Secretary of the Treasury, conceived the plan of making the bank-note circulation of the country a means of enlarging the sales of government securities. In his report for that year he suggested that Congress should take control of the national circulation and require that it be secured by the deposit of government bonds in the Treasury. Among the advantages to be gained, he said, would be uniformity of style, uniformity of goodness, and a large demand for government securities. Of these three merits the last was not the most important, although it then seemed so. Uniformity of the currency, in both appearance and quality, was a boon of inestimable value, upon which rests Mr. Chase's title to fame; yet the expectation that the scheme would be a great financial aid to the government was the real motive for its adoption. In point of fact it contributed very little aid. The transition from the old system to the new was so slow that only $98,896,488 of national bank notes were outstanding on the 3d of April, 1865, the month in which General Lee's army surrendered. This was less than 4 per cent of the money borrowed by the government for the war.

Origin of the System

The first attempt to pass a national bank bill in the House was defeated on July 12, 1862. In the following December the Secretary renewed his recommendation with great

earnestness, and President Lincoln repeated it in his annual message, notwithstanding which it was defeated again in January, 1863. Recourse was then had to the Senate, where it was passed by the close vote of 23 to 21. Then the House yielded and passed the Senate bill without amendment by 78 votes to 64. It became a law on February 25, 1863. Mr. Hugh McCulloch of Indiana, who had come to Washington to oppose it, became the first comptroller of the currency under it. He suggested so many amendments that a complete revision of the act was made by Congress the following year, and passed on June 3, 1864. There was no discriminating tax on the notes of state banks in the original, or in the amended, act. In February, 1865, a bill imposing a tax of 10 per cent on such notes was passed in the House by a majority of one vote and in the Senate by a majority of two. It did not become operative, however, until August 1, 1866.

Difficulty of passing the Bill.

The most important features of the national bank act at the present time are the following:

There is a bureau in the Treasury Department having charge of all matters relating to national banks, the chief officer of which is the comptroller of the currency. His term of office is five years. He is required to present to Congress an annual report showing the condition of each national bank and an abstract of the condition of all of them.

Comptroller.

Any number of persons not less than five may form an association for banking purposes, to continue not more than twenty years. After the association is formed it is within the discretion of the comptroller to give it a certificate (which is the equivalent of a charter) or not. The law requires that, before granting a certificate, he shall satisfy himself that the persons forming the association are of good character, and that they have

Organization.

paid in the amounts of money required for the legitimate objects contemplated by the national bank act. He may ascertain these facts by means of a special commission appointed by him for the purpose, if he chooses; and if, for any reason, he declines to grant the certificate, he is not required to give his reasons for withholding it.

No national bank can be organized with a capital smaller than $25,000, and banks of this size can be organized only in places of three thousand inhabitants or less. Banks with a capital of not less than $50,000 may be organized in places of not exceeding six thousand inhabitants. In places of more than six thousand and less than fifty thousand inhabitants there shall be no bank with a capital smaller than $100,000. In cities of fifty thousand inhabitants, or more, there shall be no bank with a capital smaller than $200,000. The sanction of the Secretary of the Treasury, in addition to that of the comptroller of the currency, is required for the granting of a certificate for a bank of less than $100,000 capital, because greater precautions are supposed to be needed in the establishment of the smaller banks than of the larger ones. Yet experience has not proved that the former are more liable to failure than the latter. At least 50 per cent of the capital must be paid in before the bank can begin business, and the remainder must be paid in monthly instalments of not less than 10 per cent each. If any instalments are not so paid, the shares must be advertised and sold to other persons. If no purchaser is found within three weeks, the amount already paid must be forfeited to the association. The shares of the bank must be of $100 each.

Capital Stock.

The powers of banks are limited to the discounting and negotiating of promissory notes, drafts, bills of exchange, and other evidences of debt; receiving deposits; buying

and selling exchange, coin, and bullion; loaning money on personal security;[1] and issuing circulating notes. They are not allowed to hold real estate permanently except such as may be necessary for the transaction of their business. If they acquire other real estate as security for bad debts, they must sell it within five years. If a bank were allowed to hold, for indefinite periods, lands and buildings thus acquired, its whole capital might gradually be absorbed in that way, and thus, although solvent, it might cease to be a bank.

Powers.

Each bank, before commencing business, must deposit with the Treasurer of the United States a certain amount of registered bonds of the United States, whether it issues circulating notes or not. If the capital of the bank exceeds $150,000 it must deposit at least $50,000 of bonds. If the capital is $150,000 or less, it must deposit an amount equal to one-fourth of its capital. The act of 1864 required all banks to deposit bonds to the amount of one-third of their capital. The main purpose of the clause was to sell bonds in the exigency of war. After the exigency had passed away the clause was modified so that a bank of $10,000,000 capital is not required to deposit more than one of $200,000. No good reason now exists why

Deposit of Bonds.

[1] The act of 1863 authorized banks to make loans "on real and personal security." In the act of 1864 the words "real and" were omitted. It is therefore unlawful for a national bank to lend money on mortgage security but it may, in order to save a bad debt, take such security for loans previously made in good faith. The prohibition of mortgage loans as a feature of banking law is first found, on this side of the ocean, in the charter of the Bank of Montreal, dated March 17, 1821, where it stands in these words as one of the powers granted: "To take and hold mortgages and *hypothèques* on real property for debts contracted to it in the ordinary course of its dealings, *but on no account to lend on land, mortgage, or hypothèque,* nor to purchase them on any pretext except as here permitted."— BRECKENRIDGE'S *Canadian Banking System*, p. 24.

a bank without circulation should keep any permanent deposit of bonds in the Treasury.

Directors.

The business of a bank must be managed by a board of not less than five directors, each of whom must own not less than ten shares of the capital stock not hypothecated or pledged as security for debt. If any director shall cease to be the owner of ten shares, he shall thereby cease to be a director. Vacancies in the board of directors shall be filled by appointment made by the remaining directors.

State banks may enter the national system by conforming to the provisions of the national bank act, and any state bank having branches may continue to have the same branches after entering the national system.

Liability of Shareholders.

The shareholders of a national bank shall be held individually responsible for all the debts of the bank, to an amount equal to the par value of their shares, in addition to the amount invested therein. An exception was made in favor of any bank "now existing under state laws having not less than $5,000,000 of capital actually paid in and a surplus of 20 per cent on hand." There was only one such bank existing when the law was passed, — the Bank of Commerce in New York, — the shareholders of which are accordingly exempt from the double liability clause.

Circulating Notes.

Each bank shall be entitled to receive from the comptroller of the currency an amount of circulating notes equal to the par value of the bonds deposited by it, but not exceeding the market value thereof, and not exceeding its capital stock actually paid in. Whenever the market value of the bonds deposited is reduced below the amount of the circulation, the comptroller may demand the deposit of additional bonds, or of money, equal to the deficiency. Bonds may be withdrawn

by banks by retiring their circulating notes or by depositing lawful money to an equal amount in the Treasury. Only $9,000,000 in the aggregate can be thus retired in one month, nor can the amount of bonds deposited be reduced below the limitations above stated. The notes are receivable at par for all dues to the United States except duties on imports, and are payable for all debts owing by the United States *within the United States*, except for interest on the public debt and for redemption of the national currency. Every bank must receive the notes of every other bank at par in payment of any debt due to itself. No notes shall be issued of less denomination than $5.00, and only one-third of the amount issued to any bank shall be of the denomination of $5.00. Each bank must redeem its circulating notes on demand at its own counter. It must also have and keep on deposit in the Treasury of the United States, in lawful money, a sum equal to 5 per cent of its circulation, to be held for the redemption of such circulation when presented in sums of $1000 or any multiple thereof. The cost of transportation and of assorting the notes must be paid by the bank issuing the same. All defaced and mutilated notes received at the Treasury shall be replaced by new ones at the expense of the issuing bank.

Their Redemption.

Any bank depositing lawful money in the Treasury for retiring its circulation shall pay in advance for transporting and redeeming the same a sum equal to the average cost of the redemption of national bank notes for the preceding year. At the expiration of the charter of any bank all of its outstanding notes shall be redeemed as they reach the Treasury; and if the charter is renewed, new notes of different design and corresponding amount shall be issued to the bank. At the end of three years from the expiration of the old charter the

Retirement of Circulation.

bank shall deposit in the Treasury lawful money sufficient to redeem the old circulation still outstanding. Any gain resulting from the loss, destruction or disappearance of notes shall inure to the benefit of the United States.[1] No bank can issue post notes or any notes to circulate as money except as authorized by the national bank act.

Redemption of Failed Bank Notes.

In case of default by any bank in the redemption of its circulating notes, the comptroller must declare the security bonds forfeited to the United States and give notice to the holders of the notes to present them at the Treasury for payment, "and the same shall be paid as presented, in the lawful money of the United States." Then the comptroller may in his discretion cancel the bonds to an equivalent sum, or sell at public or private sale so much of them as may be necessary. In case of a deficiency in the proceeds of all the bonds to reimburse the government for the redemption of the notes, the United States shall have a paramount lien on all the assets of the bank (which includes the liability of shareholders), and the deficiency must be made good before any other debts are paid. When the notes are paid, they must be canceled.

Tax on Circulation.

Each bank must pay to the Treasurer of the United States a tax of one-fourth of 1 per cent each half year on the average amount of its notes in circulation when said notes are secured by the deposit of bonds of the United States bearing interest at 2 per cent per annum. When secured by bonds bearing

[1] The gain resulting to the government after the expiration of the first series of twenty-year charters and until November 1, 1901, from the non-presentation of bank notes for redemption has been $2,975,250. The amount of notes outstanding during the period fluctuated between $100,000,000 in 1865 and $340,000,000 in 1875. The rate of destruction and loss of notes in the hands of the people may be roughly estimated at 1 per cent in twenty years.

a higher rate of interest, the tax is one-half of 1 per cent each half year. The tax does not apply to circulation, for the retirement of which lawful money has been deposited in the Treasury.

All notes used for circulation as money other than those issued under these conditions by national banks are subject to a tax of 10 per cent, to be paid by the person, firm, association, corporation, state bank, town, city, or municipal corporation which issues or pays them out.

Every bank in certain cities of 500,000 or more inhabitants, called reserve cities, must keep a reserve of lawful money equal to 25 per cent of its deposits. All other banks must keep a like reserve of 15 per cent, but three-fifths of the said 15 per cent may consist of balances on deposit in banks approved by the comptroller, in the reserve cities. Any bank in the reserve cities may keep one-half of its reserve as deposits in a "central reserve city," *i.e.*, New York, Chicago, or St. Louis. Both gold certificates and silver certificates shall be counted as part of the reserve. The 5 per cent redemption fund on deposit with the Treasurer of the United States shall also be counted as part of the reserve. Failure to keep the legal reserve is followed first by notice from the comptroller to make good the reserve within thirty days. In case of failure to do so, the comptroller may, with the concurrence of the Secretary of the Treasury, put the bank in liquidation. This clause is rather for warning than for immediate enforcement. No bank would be excused for stopping payment of its deposits when it still had 25 per cent of the same in cash. Whether severe measures should be taken, in case the reserve were below the legal limit, would depend upon the general character of the bank and the nature of its assets. Banks when below their legal reserve are not allowed to increase their liabilities by making new loans or

Legal Reserve.

discounts otherwise than by purchasing bills of exchange payable at sight, or to make any dividend of profits until their reserve has been restored.

Banks are allowed to charge such rates of interest on loans as are allowed by the law of the state in which they are situated, and no more, but in discounting bills of exchange on other places they may charge the current rate of exchange in addition.

Usury.

One-tenth of the net profits must be carried to the surplus fund of each bank until the surplus is equal to 20 per cent of the capital.

A bank must not lend more than one-tenth of its capital to one person, corporation, or firm, directly or indirectly. But the discount of bills of exchange drawn in good faith against actually existing values, and the discount of commercial or business paper actually owned by the person negotiating the same, shall not be considered as money borrowed. A bank must not lend money on the security of its own shares, nor be the purchaser or holder of its own shares unless they are taken as security for a debt previously contracted in good faith, and shares so taken must be sold within six months.

Restrictions.

No bank can become indebted to an amount exceeding its unimpaired capital except for circulating notes, deposits, drafts drawn against its own funds, and dividends due to its own shareholders. No bank can permit any part of its capital to be withdrawn in the form of dividends or otherwise. If the capital is impaired by bad debts or otherwise, the deficiency must be made good within three months after receiving a requisition from the comptroller, under penalty of being put in liquidation. No bank can certify a check for a customer for more money than he has on deposit at the time.

Each bank must make to the comptroller not less than five reports each year, showing its condition at dates, already

past, to be designated by him, and he may call for special reports from any particular bank whenever he chooses to do so, which reports shall be published in a newspaper in the place where the bank is situated, and at the expense of said bank.

Reports.

The shares of national banks are liable to taxation by authority of the states in which they are situated, at the same rates as other moneyed capital owned by the citizens of such states, but the shares of any national bank owned by non-residents of a state shall be taxed in the city or town where the bank is located and not elsewhere.

State Taxation.

The comptroller of the currency, with the approval of the Secretary of the Treasury, shall appoint suitable persons to make examinations of the affairs of every bank and to make full and detailed reports thereon to the comptroller. The fees allowed by law to the examiners shall be paid by the banks examined.

Bank Examiners.

In case of the insolvency of a national bank the comptroller of the currency may appoint a receiver, who shall take possession of its books, records, and assets and proceed to wind up its affairs and enforce the personal liability of the shareholders. A receiver may be appointed also in case the capital stock of a bank is reduced below the legal minimum and remains so for thirty days; also for failure to make good its lawful money reserve within thirty days after notice; also for purchasing or acquiring its own stock except to prevent loss upon a debt previously contracted in good faith; also for the false certification of a check.

Receivers.

No bank can either give or receive national bank notes or United States notes, or gold certificates, or silver certificates as security for a loan of money, or agree for a consideration to withhold such notes or certificates from use.

It is not lawful for any person to design, engrave, print, or use any handbill or advertisement in the likeness or similitude of the circulating notes or other obligations of any national bank, or intentionally mutilate, deface, or disfigure any such notes or obligations.

The penalty of fine and imprisonment is imposed for counterfeiting bank notes or knowingly passing or attempting to pass counterfeited notes; also for issuing the circulating notes of banks that have expired; also for falsely certifying checks; also for embezzling the funds of banks or putting the notes of a bank in circulation without authority from the directors; also for making a false entry in the books or reports of a bank with fraudulent intent, or aiding or abetting the same.

Public Deposits.

Any national bank may be designated by the Secretary of the Treasury as a depositary of public money. A certain number have been so designated, in places where no subtreasury exists, for the convenience of the government in making local disbursements. These are called regular depositaries, and the deposits of the government therein are running accounts like those of private persons, upon which no interest is paid. Deposits made in banks for the purpose of restoring funds to the money market are termed special deposits, for the withdrawal of which notice is given in advance, and upon these the act of May 30, 1908, provides that interest shall be paid at such rate as the Secretary of the Treasury may prescribe, not less than 1 per cent per annum.

On Sept. 1, 1909, the number of national banks existing was 6977.[1] The table on the following page is a condensed abstract of their condition at that time as shown in the comptroller's annual report:

[1] September 30, 1910, the number of banks was 7173, and the capital $1,002,735,123.

Condensed Abstract of the Condition of the National Banks of the United States, September 1, 1909

Resources		Liabilities	
Loans and discounts	$5,128,882,351.18	Capital stock paid in	$944,642,067.00
Overdrafts	29,552,241.16	Surplus fund	597,981,875.93
United States bonds	707,882,470.00	Undivided profits	203,756,438.40
Other bonds to secure United States deposits	17,991,758.00	Bank notes outstanding[1]	658,040,356.00
Premiums on United States bonds	14,721,196.01	Individual deposits	5,009,893,079.79
Bank houses and furniture	200,076,548.33	United States deposits	35,226,912.62
Bonds, stocks, and securities	898,388,542.68	Deposits of disbursing officers	13,477,970.65
Gold and gold certificates	519,440,108.88	Bills rediscounted	14,080,171.01
Silver dollars	12,753,590.00	Bills payable	36,228,978.29
Silver certificates	117,697,856.00	Dividends unpaid	2,157,903.84
Fractional coin	16,506,342.50	Due to other national banks	972,726,169.47
Legal tender notes	187,693,960.00	Due to state banks	472,371,866.28
Five per cent redemption fund	32,488,612.28	Due to reserve agents	38,638,667.58
Due from other banks, etc.	1,689,878,799.82	Due to trust companies, etc.	535,077,024.25
		All other liabilities	39,654,895.73
Total	$9,573,954,376.84	Total	$9,573,954,376.84

[1] Bank notes outstanding March 31, 1908, $696,407,355.

RECAPITULATION

The national banking system was born of the financial exigencies of the Civil War. Its plan was outlined by Secretary Chase in 1861, and was recommended by him to Congress as a means of promoting the sale of government bonds, and incidentally of securing uniformity of design and uniformity of value in the national currency. The sale of government bonds was to be promoted by requiring that all national bank notes be secured by the deposit of such bonds in the Treasury. Congress did not, however, approve of the plan when first presented. The bill to carry it into effect was twice rejected by the House of Representatives, but was passed by both houses in February, 1863, and revised and repassed in June, 1864. In 1865 an act was passed imposing a tax of 10 per cent on the notes of state banks. The intention and effect of this act were to compel such banks either to come into the national system or to cease issuing notes to circulate as money.

The regulations of banking adopted in the act of 1864 were selected from state bank systems then or previously in existence. Most of these regulations can be found in the preceding pages of this work. The supreme merit of the national system consists in the unification of banking in all the states and territories. Aside from this, the only new ideas embodied in the law were the government's immediate responsibility for the note issues and the requirement that each bank should receive the notes of every other bank at par in the payment of dues to itself. The government's immediate responsibility for the notes, however, is merely a corollary of the requirement that all notes shall be secured by United States bonds deposited in the Treasury.

CHAPTER XV

STATE BANKS AND TRUST COMPANIES

State Banks.

ALONGSIDE of the 6977 national banks, and competing with them, are 11,319 commercial banks operating under state charters, with an aggregate capital of $416,059,900 and deposits amounting to $2,466,958,665. The general principles applicable to the former apply also to the latter, but there are differences of detail: (1) state banks are prevented, by the 10 per cent federal tax, from issuing circulating notes; (2) national banks are required by law to keep a cash reserve of 25 or 15 per cent, as already specified, while the reserve requirements of the several states are various, but usually smaller than those of the national law; (3) no national bank can exist with a smaller capital than $25,000, but some states allow banks of $5000 capital, while in ten states there is no minimum of capital fixed by law;[1] (4) national banks are not permitted to make loans on real estate security; there is no such restriction on state banks, but in some states the amount loanable on mortgage is limited to a certain proportion of the capital; (5) national banks are subject to examination and supervision by the comptroller of the currency. State supervision of incorporated banks is of various kinds. In some states regular examinations are made by public officers; in others they are made only at the instance of stockholders or creditors of particular banks; in others the only requirement is a report from the bank's officers to be published in the newspapers.

[1] Barnett's *State Banking in the United States*, p. 26.

These differences in law and practice account for the existence of the two kinds of banks running on parallel lines throughout the country.[1] Some of the state banks are incorporated under special charters of ancient date. Of this kind is the Manhattan Company of New York. Others have been organized under general banking laws, and still others under general incorporation laws of their states.

In addition to these are many private banking houses not incorporated, which transact the business of deposit and discount. Some of these in the large cities are of great magnitude, but do not usually discount commercial paper, although they receive deposits. They are financial houses engaged in promoting new enterprises, issuing letters of credit, selling bonds of railroads and other corporations, making loans to state and city governments, etc. The rapid growth of private banking in recent years, however, has been chiefly in the western and southern and Pacific states, in communities not large enough to support incorporated banks. In some states private bankers are subjected to the same supervision as incorporated banks, but usually they are a law unto themselves, and this laxity has led to disastrous consequences in certain places and especially in New York City, where foreign immigrants have been defrauded by men of their own nationality, setting themselves up as bankers, accumulating deposits, and eventually absconding with the proceeds.

Private Banks.

[1] In the starting of towns in the West a bank is one of the first adornments of the new community, and it commonly happens that the organizers have less than $25,000 with which to begin operations. So they start a state bank, knowing that they can obtain a national charter at a later period, if they desire it. A recent writer says that in some cases two or three banks are started before the town is a month old — all being state banks. Generally the managers combine the banking business with real estate agencies, fire insurance, life insurance, and farm mortgages.

The question has been raised in recent discussions whether the cash reserves of state banks may consist in whole or in part of national bank notes, and what would be the consequences of so using them. The answer is that bank notes are not cash, and that any bank which treats them as such incurs the risk of being caught, in some financial exigency, without sufficient lawful money to meet its demand obligations. As a state bank cannot ordinarily acquire national bank notes for less value than an equal amount of gold or greenbacks, there seems to be no good reason for incurring that risk. The national banking law does not concern itself with the reserves of state banks, but it prohibits any national bank from pledging, or hypothecating, its circulating notes for the purpose of procuring money to be used in its banking operations, or otherwise. Therefore any arrangement made between a national bank and a state bank to swap temporarily the notes of the one for the gold of the other would be unlawful.

Cash Reserves.

A trust company, as its name implies, is a corporation organized to receive and perform trusts for a compensation fixed by law, or agreed upon by the parties to the trust. One of the most common forms of trust is that of railway mortgages, where the trust company becomes the mortgagee in trust for the bondholders, registers the bonds, collects the interest as it becomes due, pays it to the bondholders, and in case of default takes legal steps to protect their interests. But in the progress of time the trust companies drifted into the banking business, buying commercial paper, lending on collaterals, etc., so that in the large cities the trust business became an insignificant part of their total business, perhaps not more than 5 or 6 per cent of the whole. Thus they have become important rivals of the national banks in the principal cities of the Union. One thousand and seventy-nine companies reporting to the

Trust Companies.

comptroller of the currency in 1909 show a capital of $362,763,223, and deposits amounting to $2,831,835,177. In the year 1905 the thirty-three trust companies of New York City held $1,008,000,000 of deposits, while the national banks in the same territory held only $947,000,000, and a portion of the latter consisted of deposits made by and belonging to the former. The bulk of the reserves of the trust companies was kept as deposits in the banks, for which deposits they received a low rate of interest. They were thus enabled to pay interest to individual depositors, which the banks did not do, and in this way they attracted deposits which would otherwise have gone to the banks. Thus there was an ever present temptation to incur demand liabilities resting upon inadequate cash reserves, and this constituted an element of danger in the financial situation, upon which public attention was at once focused when the first symptoms of panic were shown in October, 1907.

The inherent danger of the trust company aiming to do a trust business and a banking business simultaneously was shown by the sudden failure of the Knickerbocker Trust Company, which had 17,000 demand deposit accounts. This failure started the panic in New York, for which there was plenty of inflammable material. The demonstration of the weakness of trust-company banking made so great an impression on the public mind that Governor Hughes appointed a commission, with A. B. Hepburn, ex-comptroller of the currency, at its head, to investigate and report upon the subject, with a view to remedial legislation. In pursuance of the report of this commission the Legislature passed a law requiring trust companies in the borough of Manhattan, New York City, to keep a cash reserve of 15 per cent against all deposits payable on demand, or at less than thirty days' notice, except such as are secured by New York state bonds.

New York State Law.

This reserve must consist of lawful money of the United States, gold certificates, silver certificates, or national bank notes. Trust companies in other boroughs of New York City may keep one-third of their reserves as deposits in other banking institutions approved by the superintendent of banks. Trust companies in other parts of the state may keep one-half of their reserves as deposits in other banking institutions so approved. Accordingly there is no legal requirement of any cash reserve at all in any trust company in New York, since the reserve may consist of bank notes, or New York state bonds, or partly of one and partly of the other. The same rule applies to state banks, except that those in the borough of Manhattan must keep 25 per cent of reserves; in other boroughs of New York City, 20 per cent, and elsewhere 15 per cent.

This condition is not so menacing as it appears, when we reflect that the enactment of a minimum cash reserve is the exception and not the rule in the bank legislation of the world. It must be considered indiscreet, however, for if it is desirable to regulate cash reserves by law they should at least consist of cash. National bank notes, which are the debts of certain banks, are in turn bottomed on the debts of the government. Thus the legal reserves of New York trust companies are two removes distant from cash, and the only reason for allowing this practice is that it saves the trouble of sorting and separating the currency that comes in as deposits. But it checks the wholesome process of bank-note redemption. Trust companies which do a general banking business ought to keep the same amount and kind of reserves against their demand liabilities, and should be subject to the same laws, as other banks.

Bank Notes as Reserves.

Eighteen states of the Union require no cash reserve at all for their banking institutions. They leave this to the discretion of the bankers themselves, as is the custom in nearly all

countries. Of the states that fix a minimum reserve some require that it shall consist of "lawful money"; others, "lawful money of the United States"; others, "money," "cash," "actual cash," "cash in hand," and "available funds." Five states (California, Connecticut, Minnesota, New York, and Pennsylvania) specify national bank notes as lawful reserves. Several states allow a portion of the reserves to consist of bonds of the state itself, or of the United States.[1]

Bond Reserves.

On the 7th of January, 1911, the insolvency of the Carnegie Trust Company became known, and that institution was closed by the New York State Superintendent of Banking. The disturbance did not spread, but it led the responsible heads of some of the large financial institutions of the city to take steps to prevent bad banking from becoming epidemic. The clearing house committee, at the instance of Honorable A. B. Hepburn, took the matter in hand and recommended that all trust companies of the city having not less than $1,000,000 capital each, be allowed to become members of the clearing house on condition of maintaining a cash reserve of 25 per cent, of which at least 15 per cent should be in their own vaults and the balance on deposit in banks which keep 25 per cent reserve. This recommendation was adopted by the clearing house banks, May 9, 1911. Sixteen trust companies immediately availed themselves of the opportunity to become members.

Trust Companies and the New York Clearing House.

[1] This is a misuse of terms, since a bank reserve signifies something which can be immediately used to pay the demand obligations of the bank. Whole days have passed in New York during panics, when no bid could be obtained for any kind of bonds, even those of the United States. Therefore a law authorizing a given percentage of bank reserves, to be held in any securities whatever, is a reduction of the reserve itself by that percentage, and ought to be so expressed in the law.

In order to safeguard banking interests more perfectly it was decided at the same time to adopt the system of mutual bank supervision and examination which the clearing house of Chicago put in force after the failure of the Walsh banks in that city. When the Chicago clearing house, in order to avert a panic, assumed the liabilities of the Walsh banks, they virtually insured the community against future bank failures. In order to do so, however, they deemed it necessary to know the condition of each and every bank from day to day. Nearly all bank failures are caused by speculations inside the bank, or promoted by the leading officers, or by loans on unsound security, or by loans to particular persons contrary to law, or in excess of the dictates of prudence. These errors usually have small beginnings, and can be nipped in the bud if discovered early. They are easily recognizable by an examiner acquainted with local conditions. Usually the fact that such examinations are frequent will deter the banker from making bad loans, since the existence of unsound paper in his portfolio will speedily be known to his competitors in business and he will be discredited accordingly. This system of mutual bank examination is now in practical operation in Chicago, Philadelphia, St. Louis, San Francisco, Los Angeles, Kansas City, Minneapolis, St. Paul, and St. Joseph, as well as New York. It is perhaps the most important advance in banking science that has taken place in this country since the passage of the National Banking Act.

Mutual Bank Examination.

An Important Advance in Banking Science.

RECAPITULATION

State banks exist and transact business in competition with national banks in all parts of the country, but are prevented by the federal tax from issuing circulating notes.

The cash reserves of state banks are usually a smaller percentage of their deposit liabilities than those of national banks. Some of them are allowed to use the bonds of the state in which they are incorporated, or those of the United States, or both, as a part of their cash reserves. The use of bonds for that purpose is equivalent to a reduction of the reserve itself, since bonds are not cash.

Trust companies, incorporated under state laws, exist and transact business in competition with both state banks and national banks. Originally designed to administer trusts, such as decedent estates, guardianships, mortgages, etc., of which the liabilities are payable at fixed periods, they have gradually entered the field of banking and incurred large demand liabilities for individual deposits, for which they allow interest, and which they redeposit in national banks. With the money thus attracted from depositors they make loans on collateral security, buy commercial paper, and transact a general banking business; and for their unused balances receive interest from the regular banks. In other words, they receive interest on their cash reserves, keeping no cash in their own vaults except a small amount of till money. Thus they have a manifest advantage over the banks and have grown enormously in recent years at the expense of the banks, but at the risk of disaster to themselves and to the community. To correct this growing menace legislation has been lately invoked and laws have been enacted (in New York) requiring trust companies to keep a fixed percentage of cash reserve in their own vaults. Banks in some cities, where the competition of trust companies has been severe, have organized, under state laws, trust companies composed of their own shareholders, as an annex to their own business, but separately managed and officered, and in these annexes they pay interest on deposits and safeguard the business which might otherwise be taken from them.

CHAPTER XVI

FOREIGN BANKING SYSTEMS

THE BANK OF ENGLAND

In order to obtain money to carry on a war in which the fate of the dynasty and of the Protestant religion was supposed to be involved, Parliament in 1694 passed an act creating a corporation for ten years, to be called the Governor and Company of the Bank of England. On condition that the said corporation should lend to the government at once the sum of £1,200,000 the government was to pay 8 per cent interest, plus £4000 per year for expenses, — a rate much less than the treasury had been accustomed to pay. The bank was empowered by its charter to deal in bills of exchange, to buy or sell coin and bullion, to lend money on the security of goods, wares, and merchandise, and to sell such goods if the loan was not repaid. It was not permitted to incur debt exceeding £1,200,000 or to deal in goods, wares, or merchandise except as above stated.

Bank of England.

The subscription to the capital was completed within ten days after the books were opened, and with the money thus obtained the war was brought to a successful termination. The scheme was well conceived; for it established a credit by means of which the wealth of the community could be mobilized for the use of the army. The bank advanced its capital to the government, but recovered it presently by issuing an equal amount of its own notes, which the public accepted at par

Successful Beginning.

because they had confidence in the bank. The notes of the bank were to pass by indorsement, were payable at such times as the bank might determine, and were not legal tender. An amendment to the charter passed in 1697, providing for an increase of the capital stock by £1,001,171, authorized the issue of notes to the same amount, payable to bearer on demand, and required that they should have a mark to distinguish them from the earlier issue. The first notes issued were post notes drawing interest. The next batch (those of 1697) were demand notes drawing no interest. The people accepted them at par, and the bank again loaned an equivalent amount of specie to the treasury.

In 1709 Parliament granted a quasi monopoly to the bank by a provision that no other corporation and no private partnership composed of more than six persons should exercise the right of issuing circulating notes "in that part of Great Britain called England." This was reënacted in 1742, with the added provision that the said Governor and Company of the Bank of England were thereby "declared to be and remain a corporation with the privilege of *exclusive banking as before recited.*" The terms used show that in common acceptation the word "banking" was inseparable from the issue of circulating notes; and, in fact, for more than a hundred years everybody understood that this was a prohibition against deposit banking, as well as against note issues, by stock companies.

Monopoly of Note Issues.

The charter was renewed from time to time, on varying conditions, usually on the condition of fresh loans to the government or a reduction of the rate of interest on former ones. It passed through many vicissitudes, the most important of which was the suspension of specie payments for a period of twenty-four years, from 1797 to 1821. This suspension of cash payments

The Restriction.

is commonly called the "Bank of England Restriction," because the bank was restricted, first by the Privy Council, and afterwards by Parliament, from paying specie for its obligations. The suspension was not due to commercial causes but to the large subsidies advanced by the bank, and paid by the government to continental powers, for carrying on the war against revolutionary France.

Until 1829 bank notes of the denomination of £1 were in common use in all parts of the United Kingdom. In consequence of the panic of 1825, which was attributed to excessive issues of bank notes, an act was passed, and is still in force, prohibiting the issue of notes in England smaller than £5. It did not apply to Scotland or Ireland. The intention and effect of this act were to saturate the currency with a larger infusion of gold. This gave greater stability to commerce but also entailed loss resulting from the abrasion of coin, which has been and is still a source of anxiety to English statesmen and financiers.[1]

In 1833 Parliament passed an act making the notes of the Bank of England, so long as they are redeemed in gold on demand, legal tender at all places in England and Wales except at the bank itself.

Not until the year 1844 was any novelty introduced into the bank's methods of business. At that time the opinion prevailed generally that commercial crises were caused by excessive issues of bank notes. The exclusive right of issue granted to the bank in 1709 and 1742 had been so far relaxed in 1826 that joint stock banks were allowed to issue notes at a distance of sixty-five miles from London; and seventy-two such banks had been established. England had been afflicted with commercial crises in 1825, 1836, and 1839. These were ascribed to over-issues of bank paper. Sir Robert Peel, the prime minister,

Sir Robert Peel.

[1] See page 24.

was of the opinion that bank notes ought to be kept under rigid limitations, although book credits in the form of deposits might be safely left to the discretion of the banker. At his instance the charter of the bank (which was about expiring) was amended in the following manner: The issue department was to be wholly separate from the banking department. The sum of £14,000,000 of securities, including the government's debt to the bank, was to be transferred to the issue department, which should thereupon turn over to the banking department £14,000,000 of notes. This was the average amount of the bank's notes then outstanding. Any person should be entitled to receive notes from the issue department additional to the aforesaid sum, in exchange for gold coin or for standard gold bullion at the rate of £3 17*s.* 9*d.* per ounce. Banks and banking firms having the right to issue notes at that time might continue to issue the same average amount; but if any should cease to do so, the Bank of England might be authorized by the Privy Council to issue two-thirds of the amount so withdrawn, by adding an equivalent sum to the government securities in the issue department. Under the operation of this clause the circulation of the bank against securities has been raised to £18,450,450.

The Act of 1844.

The effect of the act of 1844 was to make the issue of notes automatic. Nobody has any discretion as to the amount of notes which shall be in existence at any time. Setting aside the fixed sum issued against securities, the remainder of the circulation is just what it would be if it were composed of gold exclusively. The additional notes represent merely the superior convenience of paper over coin in the way of manipulation and carriage. The bank itself cannot get notes on terms different from those open to the public. To get fresh supplies it must take gold out of the banking department and transfer it to the

issue department, and to recover the gold it must reverse the process.

The restriction put upon the credit circulation in England in 1844 was coincident with a great increase of deposit banking, and it produced no immediate pinch. As population and trade enlarged, more media of exchange were needed. These came partly in the form of gold and of notes issued for gold, but chiefly in the form of bank checks. As the latter were the creation of trade, they were always commensurate with the wants of trade among urban populations and in places where banking facilities existed. It was an advantage also that they were available in sums smaller than £5. So Peel's Act gave general satisfaction. Yet it has been the object of attack by some of the foremost English economists and writers on banking.[1] No other economic question, not even that of free trade, has been so hotly and persistently debated. The opponents of the act contend that it prevents the bank from using its credit in the only mode available for quelling panics, — that is, by the free issue of a currency that everybody will accept. They point to numerous crises prior to 1844 where the bank averted disaster by the policy of expanding its note issues. They point to three crises since 1844, — those of 1847, 1857, and 1866, — in each of which the government suspended the restrictive clause of the act and authorized the bank to issue notes at its own

Suspension of the Bank Act.

[1] For an argument of great force against Peel's Act, see that of H. D. Macleod in the *History of Banking in All Nations*, Vol. II, pp. 173–183.

John Stuart Mill, when called as a witness before the House of Commons Committee in the crisis of 1857, said that he was against any restrictions by law of the issue of notes, except that of convertibility. He was in favor of removing the restrictions from the Bank of England and from all other banks. — LEVI'S *History of British Commerce*, p. 399.

discretion.[1] In all these instances the panic subsided as soon as it was known that notes could be had at a reasonable price. Suspension of the bank act, however, did not mean suspension of specie payments, but merely that the bank might issue notes at its own risk without a corresponding deposit of gold. Whatever notes the bank puts out at any time it must redeem in gold on demand.

Thus the opponents of the act contend that it works well only in fair weather, but that in times of stress and danger it prevents the use of an adequate existing remedy, — namely, the credit of the Bank of England. In such cases, they say, safety can be found only by annulling the act. The defenders of the act are compelled to admit this; but they maintain that the restriction on note issues tends to check, although it does not altogether prevent, the speculations which lead to panics and crises. They think erroneously that notes are different from other forms of bank credit in their effect upon the prices of commodities and upon the foreign exchanges, and should therefore be restrained by law, even though they are immediately redeemable in gold. This was the main contention of Sir Robert Peel when he brought in his bill. It was repeated by Professor Jevons in 1875.[2] Mr. H. D. Macleod has overthrown the argument of the former, in so far as it rests upon cited instances of experience.[3] The argument of the latter is inconclusive, to say the least.

The Arguments Pro and Con.

[1] In 1857 the extra notes, if issued, were to be loaned at not less than 8 per cent interest; in 1866 at not less than 10 per cent; and the interest was to inure to the benefit of the government, not of the bank, so that the public should not seek and the bank should not issue more notes than were actually necessary. In 1847 and in 1866 the bank did not make use of its permission to issue extra notes, but the panic ceased.

[2] *Money and the Mechanism of Exchange* (American edition), p. 314.

[3] *Theory and Practice of Banking*, Vol. II, p. 150.

Yet, whatever the statesman of the present day might wisely and safely do if he had a *tabula rasa* on which to write the bank's charter, he must have regard, first of all, to the fact that British commerce and British modes of thought have fashioned themselves upon the present system. It must be said also that with the passage of the act all anxiety respecting the goodness of the circulation disappeared.

Another peculiarity of the Bank of England is that it holds the reserves of the other London banks and practically those of the whole United Kingdom. All British banks, including those of Scotland and Ireland, keep a portion of their reserves in London. All the joint stock and private banks of London deposit in the Bank of England all of their money except the small amount needed for paying over the counter. It is more convenient for them to keep it in the vaults of the bank than in their own. Their reserves range from 10 to 15 per cent of their liabilities. The bank, in order to make a profit for its own shareholders, lends to borrowers about 60 per cent of its deposits. If a country bank keeps one-half of its reserve in a London joint stock bank and the latter lends 85 per cent of this to its customers, while the Bank of England lends 60 per cent of the remaining 15 per cent to its customers, it follows that only 6 per cent of the country bank's deposit in the city bank is available anywhere in the form of cash.

The Bank keeps the Gold Reserve of the Nation.

Probably the ultimate reserve of the British banks reckoned in this way is less than 6 per cent of their demand liabilities. The remaining 94 per cent is credit. It is possible to transact the business of the United Kingdom on this small percentage of cash because the credit of the Bank of England is so good. Neither the great bank nor the lesser

ones are required by law to keep any fixed percentage of reserve, but keep such proportion as experience shows to be needful. The Bank of England has found that its line of safety ranges between 33 and 47 per cent. The other London banks find that their needs are much less.[1] The system under which this bank among many has become the keeper of the ultimate reserve of all, and under which the amount has so dwindled, is the growth of centuries. It was never invented by anybody, and if it did not now exist would be pronounced impossible. When the bank finds its metallic reserve running low it raises the rate of discount in order to attract gold from abroad. It sometimes happens that the London joint-stock banks continue lending at the lower rate after the great bank has raised its rate. In such cases the bank sends its agent into the street and borrows all the floating money that can be found, giving consols as security therefor. In common parlance "the bank borrows from the market," and thus creates a vacuum which can be filled only by money from foreign countries.

The Bank of England has branches, nine in number, in the principal commercial cities of England. It pays to the government a fixed sum for the privilege of note issue, and it manages the public debt for an agreed compensation. It receives all the collections of revenue of the imperial government in England, pays the interest on the government's obligations, and, in general, performs the duties which in this country devolve on the Treasurer of the United States. Although it performs these functions, it is a private

[1] Mr. Goschen, when holding the office of chancellor of the exchequer a few years ago, made a public speech at Leeds, arguing that the London joint stock banks ought to have much larger reserves than they habitually keep, and intimating that if they did not voluntarily adopt that policy he should bring before Parliament a measure to compel them to do so. Not one of them ever adopted this advice, nor did Mr. Goschen ever bring in any measure to compel obedience to it.

corporation managed by directors chosen by the shareholders. Its public duties are regulated by contract. Aside from these duties, the government has no more control over it than over any other London bank.

The following statement shows the condition of the Bank of England on April 8, 1908.

ISSUE DEPARTMENT

LIABILITIES		RESOURCES	
Notes issued . .	£55,724,495	Government debt	£11,015,100
		Other securities . .	7,434,900
		Gold coin and bullion	37,274,495
	£55,724,495		£55,724,495

BANKING DEPARTMENT

LIABILITIES		RESOURCES	
Proprietors' capital	£14,553,000	Government securities	£13,757,493
Rest	3,184,943	Other securities . .	30,780,629
Public deposits . .	11,223,495	Notes	26,810,275
Other deposits . .	43,742,329	Gold and silver coin .	1,406,495
Seven-day and other bills	51,125		
	£72,754,892		£72,754,892

In 1844, when the issue department was separated from the banking department, the government owed the bank £11,015,100. This debt has remained unchanged to the present time. The phrase "other securities," where it occurs under the issue department, means government securities other than this old debt. The same phrase, where it occurs under the banking department, means bills discounted and assets other than government securities. In the issue department notes are liabilities, but in the banking department they are resources because they are certificates for gold deposited in the issue department. In the foregoing statement the reserve is 51 per cent of the liabilities to the public.

Points of similarity and of difference between the English bank-note system and our own may be here noted:

English	American
An arbitrary amount of notes issued against government securities in the custody of the bank; no notes smaller than £5.	All bank notes issued against government securities in the custody of the Treasury; no notes smaller than $5.00.
Bank notes in addition to the foregoing issued in unlimited amounts on the deposit of gold coin or bullion.	Gold certificates issued by the Treasury in unlimited amounts on the deposit of gold coin; none smaller than $20.

THE SCOTCH BANK SYSTEM

The monopoly of banking which existed in England from 1709 to 1826 did not prevail in Scotland. In the latter country there was room for a development unrestrained by legal enactment, and this freedom led to interesting results.

The Scotch Banks.

The Bank of Scotland was chartered in 1695 with unlimited powers of note issue and with monopoly privileges for twenty-one years. When the monopoly expired in 1727, it was not renewed, but the bank continued to exist. In that year the Royal Bank was chartered. This institution, finding a scarcity of commercial paper in the market, devised a new method of using its unemployed capital, known as the system of cash credits, which forms a peculiar feature of Scotch banking.

Cash Credits.

A cash credit is a permission extended by the bank to a borrower to draw money as it is wanted, not exceeding a certain sum, paying interest for the time and amount actually used. The principal difference between a cash credit and an ordinary discount is that the former is "accommodation paper," — that is, not based upon any completed commercial transaction. For this reason personal security, in addition to that of the borrower, is

required. The indorsers, or "cautioners," as they are termed in Scotch law, are never less than two in number and frequently three or more. The cautioner has the right to inspect the account of the borrower at any time, and to stop the credit at any point, if he wishes to terminate his liability there. Cash credits are based upon knowledge of the character of the borrower and of the responsibility of the cautioners. By means of cash credits young men of enterprise and integrity are enabled to make a start in the world without waiting to accumulate capital from their own earnings. Sometimes, too, a business opportunity presents itself which a man would not undertake unless he could be sure of finding a certain amount of money before its completion. He may need it or he may not. A cash credit enables him to go forward with confidence. If he needs the money or some part of it, he pays interest for what he uses. Otherwise he pays nothing. Cash credits have played a large part in the development of agriculture in Scotland. The money advanced to farmers is not, however, loaned on mortgage, but on personal security, and the accounts are not allowed to stagnate. As a corollary to the system of cash credits, the Scotch banks pay interest on the time deposits of their customers and thus stimulate among the people the habit of saving.

The Branch System.

Another peculiarity of Scotch banking is its remarkable development of the branch system by which deposits are secured from every nook and corner of the country and by which capital is transferred easily and quickly to the places where the demand for it is greatest. There are twelve banks in Scotland, and they have 1065 branches. The system has been so developed and extended that banking facilities reach every town and hamlet in the land. Whatever assistance banks can give to industry is available to the poor and to the rich on equal

terms. In no other country has the principle of equality in bank favors been carried further. In no other has greater pains been taken to bring them to the poor man's door.

Until 1845 there was no legal limitation upon the note issues of Scotch banks. When Peel's Act was passed in England, as described above, the principles embodied in it were applied to Scotland in a modified form. It was enacted that each bank might have an issue of notes equal to the amount of notes and coin then issued and held by it. This is called the "fixed" circulation, and it amounts to £2,676,350. For any additional notes it was to hold an equal additional amount of coin, but it was not required that this coin should be held specially for the redemption of the notes; nor was there any provision for ascertaining whether the law was complied with in this particular.

Note Issues.

Notes are issued in denominations of one pound and upward. They are exchanged daily at the Edinburgh clearing house, and settlements are made between banks by drafts on London. The notes remain in circulation on the average eighteen days after each issue, the whole circulation being redeemed twenty times each year. No deposited security for bank notes has ever been required in Scotland, but note holders have a prior lien on the assets. Moreover, the liability of shareholders for note issues is unlimited. For these reasons the note issues of insolvent banks in Scotland are always accepted at par by the other banks and are never depreciated. There have been only three bank failures of any importance in Scotland: those of the Ayr Bank in 1772, of the Western Bank in 1857, and of the City of Glasgow Bank in 1878. These might perhaps have been prevented by proper public examinations.

Although deposits are received and loans are made at each branch, the branches pay out only the notes of the

parent bank, which are redeemable at the head office. So it is necessary to have real money only in one place, instead of in perhaps one hundred different places. Thus the maximum of business is done with the minimum of gold, which is the *raison d'être* of banking. Credit has been systematized in Scotland to the last degree, and has been found to answer all purposes so long as the paper sovereign can be converted into the gold sovereign, at a convenient commercial center. The gold held by the banks is usually not more than 5 per cent of their deposits, yet the Scotch banks possess the undoubting confidence of the people whom they serve.

Economy in the Use of Gold.

The notes of the Bank of England are not legal tender in Scotland. There is no legal-tender paper there, nor has the want of it ever been a cause of complaint.

In 1907 the average liabilities and resources of the twelve banks of Scotland, in thousands of pounds, were as follows:

Liabilities		Resources	
Capital paid	£9,166	Loans and discounts	£72,069
Surplus	7,557	Government securities	4,938
Circulating notes	6,776	Other securities	21,644
Deposits	109,208	Specie	5,519
Acceptances	4,832	Call money	25,470
Other liabilities	1,337	Acceptances	4,832
		Other assets	4,404
	£138,876		£138,876

THE CANADIAN BANK SYSTEM

In Canada there are twenty-nine banks, with capitals ranging from $14,400,000 and surplus $12,000,000 (the Bank of Montreal) to $301,300 (the Weyburn Bank). No new bank can be established with less than $500,000 subscribed, of which at least $250,000 must be paid before beginning business. All of the larger banks have branches, of which there are 1841 in the Dominion,

Canadian Bank System.

and 48 in other countries. Each bank is allowed to issue notes to an amount equal to its paid capital, but competition and the prompt return of the notes for redemption have always kept the circulation below the authorized amount. It ranges between 40 and 50 per cent of their capital and surplus. All banks are required by law to make arrangements to insure the par value of their circulation in any and every part of Canada, and for this purpose to establish redemption agencies at the chief city of each of the seven provinces and at such other places as may be determined by the treasury board. In practice the notes of the different banks are exchanged daily at the clearing houses in the larger cities. At other places they are exchanged between the nearest branches, and balances are paid either in Dominion notes or by drafts on the commercial centers. The notes remain in circulation on the average thirty days after each issue, the whole circulation being redeemed twelve times each year.

Note Issues.

Nor is there any discount on the notes of failed banks. The law provides for the protection of note holders (1) by giving them a prior lien on all the assets of failed banks, including a liability on the part of shareholders of double the amount invested by them; (2) by a bank circulation redemption fund contributed by all the banks, equal to 5 per cent of the average circulation of each; and (3) by a provision that the notes of failed banks shall draw 5 per cent interest from the time of default till public announcement is made of readiness to redeem them. There have been three bank failures since 1890, when these provisions of law took effect, but the note holders lost nothing; nor did the other banks lose anything from the common redemption fund.

This fund was established by Parliament, at the instance of the bankers themselves. The law called for a contribution from each bank equal to 1 per cent per annum of

its circulation until the total amount should be equal to 5 per cent thereof. It is in the custody of the Minister of Finance. It is invested in Dominion securities at 3 per cent, and the interest is paid to the contributing banks. In case of the failure of a bank its notes are redeemed out of this fund, and then the amount so expended is restored to the fund (with interest at 3 per cent) from the assets of the failed bank before any other claims are paid. The banks may be called upon for additional contributions if needed, in order to keep the fund up to 5 per cent of the outstanding circulation, but the rate of contribution is not to exceed 1 per cent per annum.

Safety Fund.

The Canadian system of note issues is based upon the "banking principle." It supplies an "elastic" currency, expanding and contracting with the variation of seasons and the wants of trade. Its system of branches tends to equalize the rates of interest in different parts of the Dominion. A bank receiving deposits in Halifax, Montreal, and Toronto may lend them the following day through its branches, and by the issue of its own notes, at Winnipeg, Vancouver, and Victoria, the branches redeeming the notes by drafts on the head office when they are presented for that purpose. The rate of interest in the smaller towns of the West is only 1 or 2 per cent higher than in the large cities of the East on the same kind of loans. To this equalization of the rate of interest both the branch system and the freedom of note issue contribute.

Branch Banks.

Under the Canadian law a bank may suspend payments for ninety days without going into liquidation; but it must not, in that interval, issue notes in payment of deposits, since that would increase the prior lien on the assets and the charge upon the common redemption fund.

The weak point of the Canadian system, as of the Scotch, is the lack of government inspection. The Minister of

Finance can call for a report of the condition of a bank at any time, but there is nothing which corresponds to our system of bank examination. In default of this the bankers have procured for their own chartered association legal powers of supervision over the making of circulating notes and the delivery thereof to the banks, the disposition made by the banks of such notes, and penalties for the breach or non-observance of the regulations applicable thereto. Thus the banks have the legal right to inspect each other so far as their note circulation is concerned, but in no other particular.

Bank Note Inspection.

The Canadian banks are not allowed to issue notes smaller than $5:00. The Dominion government, however, has legal-tender notes outstanding, varying in amount and denominations, against which there is a gold reserve of 25 per cent for the first $30,000,000 and 100 per cent for all above that sum. Canadian banks are required by law to keep 40 per cent of their cash reserves in Dominion notes, but this law, formerly obligatory, is now practically of no consequence, since the banks, as a matter of convenience, hold much more than 40 per cent of their reserves in that form.

There was no bank suspension in Canada during the commercial crisis of 1907. The government offered to loan the banks $10,000,000 at 5 per cent interest for sixty days as a help to the movement of the crops, on collateral to be approved and guaranteed by the Bank of Montreal, but only about one-half of the amount was accepted, and this has since been repaid. In order to avoid the necessity of resorting to this expedient hereafter, an amendment to the banking law has been enacted by the Dominion Parliament, providing that during the crop-moving season (October 1 to January 31) the banks may issue notes to the amount of 15 per cent of their combined capital and surplus, in addition to the amount outstanding at the beginning of the season.

The twenty-nine Canadian banks have a paid capital of $100,648,717 and a rest, or surplus, of $85,213,740, and their circulation on April 30, 1911, was $83,647,088.

The chief points of similarity and of difference between the Canadian system and our own are these:

CANADIAN	AMERICAN
Bank notes are secured by a prior lien on assets including shareholders' double liability, and by a common safety fund equal to 5 per cent of total circulation. Failed bank notes draw interest at 5 per cent.	Bank notes are secured by government bonds and by a 5 per cent redemption fund in the Treasury, and by the government's promise to redeem at once without waiting to sell the securities.
Banks are required to redeem their notes at the capital of each province and to keep them at par everywhere.	Banks are required to receive each other's notes at par in all payments to themselves, and to redeem their own notes at their counters and at Washington City.
Banks are allowed to have branches in all parts of the Dominion.	Branch banks not permitted under the national bank system, but any state bank having branches and entering the national system may retain such branches.

THE BANK OF FRANCE

The Bank of France was founded, with a capital of 30,000,000 francs, in the year 1800, at the instance of Napoleon Bonaparte, then first consul. It was an ordinary bank of discount, deposit and note issue, like the first and second banks of the United States, which character it still retains; but the government has never been a shareholder in it. It was placed under the management of fifteen regents and three inspectors, called "censors," chosen by the shareholders. In 1803 the exclusive right of note issue in the city of Paris

The Bank of France.

was conferred upon it. In 1806 a law was passed providing that the chief of the state should appoint from among the shareholders a governor and two deputy governors of the bank. Under the present law the governor must be the owner of one hundred shares of 1000 francs each, and each deputy governor must hold fifty shares. The governor has general direction of the affairs of the bank, presides at all meetings of the regents, and may veto any of their acts. No paper can be discounted that he disapproves of. He also appoints all the employees. This feature of the bank's organization has been retained under all changes of the government of France. The bank performs the same duties in the management of the public debt that the Bank of England performs in that country.

In 1848 the exclusive right of note issue in the whole of France was conferred upon the bank, but it was required to buy the other note-issuing banks, which it did by increasing its own capital stock to 91,250,000 francs. The monopoly of note issue was bestowed upon the bank in order to give greater stability to the paper currency, and it had that effect. The goodness of the notes of the Bank of France is never questioned, and its monopoly is not complained of. In consideration of the bank's services to the state, the government exacts no special compensation for the right of note issue, but requires it to pay the same taxes as other banks are liable to and also exacts a small stamp duty on its notes. The amount of notes issuable is fixed by law from time to time. In the last act (February 11, 1906) the maximum sum was fixed at 5,800,000,000 francs. The legislative body usually anticipates the demands of commerce by extending the limit before the maximum is reached. The restriction upon its issues is, therefore, more apparent than real. The Bank of France is perhaps the most notable example and illustration

Note Issues.

of the "banking principle" of note issues that the world has ever seen.

The amount of the bank's uncovered notes is relatively small. On April 9, 1908, its total issue was 4,869,281,000 francs and its specie on hand 3,678,546,000 francs. About one-fourth of the specie consists of silver five-franc pieces, which are available for the internal traffic of the country but not for foreign trade, since their metallic is much less than their nominal value. As they are legal tender, the bank must receive them as the equivalent of gold, but it may also pay them at par for all claims against itself. Accordingly, when depositors want gold for exportation, the bank is enabled to charge a premium for it, the alternative being payment in silver. This premium is a source of profit to the bank. The limit to the possible premium is the cost of collecting gold coins, of which there is always a large amount in circulation, and which brokers are ready to supply if they are paid for their trouble. Usually the bank charges no premium, but at times it charges a fraction less than the cost of obtaining gold from brokers. If it should charge more, the public would sell its gold to brokers and deposit only silver at the bank.

Cash Reserves.

Sometimes we hear that the Bank of France or the Imperial Bank of Germany is buying gold with its notes and allowing the importer of the metal interest during the time of transit from the United States. This can be done without loss whenever there is a fresh demand for its notes, provided the demand keeps the notes in circulation during the time the gold is in transit. Of the probable duration and extent of this demand the bank is well able to judge through the knowledge, which it derives from its branches, of the internal trade of the country.

In the revolution of 1848 the bank suspended specie payments, and its notes were made legal tender, but it was

prepared to resume at the end of three months. The government, however, prevented it from doing so until August, 1850, at which time resumption took place and the legal-tender act was repealed. The bank suspended again in 1870, at the beginning of the Franco-German war, and its notes were again made legal tender. The bank at that time held specie nearly equal in amount to its outstanding notes, and equal to about 75 per cent of all its demand liabilities; and its officers were prepared to meet a run, besides making the usual advances to the mercantile community and the unusual ones which, it was foreseen, would be required by the government. Rumors had, however, gained credence that specie was flowing out of the country in large amounts to Prussia, and so public opinion demanded that the bank should stop payments and that its notes should be made legal tender. On August 12, 1870, a law was passed to that effect. The same act limited the note issues to 1,800,000,000 francs. Two days later the limit was raised to 2,400,000,000 francs, and by subsequent steps to 3,200,000,000 francs in July, 1872. The bank advanced to the government during the war with Germany and the later conflict with the commune 761,000,000 francs, and continued to make advances while the new republic was establishing itself, until they reached the maximum sum of 1,530,000,000 francs. About one-half of the sum thus advanced was specie. The premium on specie at any time was, however, slight. Once it was as high as 4 per cent, but only for a short time. After the suppression of the commune it fell to 1 per cent.

Suspension of Specie Payments.

While Paris was besieged the parent bank could do nothing to assist the government, but the branches were able to do so. The Morgan loan of October, 1870, for 250,000,000 francs was guaranteed by the Bank of France. Specie payments were resumed on January 1, 1878, but the legal-tender quality of the

notes of the bank was not repealed. It was retained at the instance of the business community outside of Paris, as a matter of convenience in the handling and transfer of money.

The Bank of France is required by law to have at least one branch in each department of France. It has also a large number of subsidiary offices in places too small to support a branch with the usual complement of officers and employees. The rate of discount is uniform at the parent bank and at all branches and offices. During recent years it has been usually 2½ to 4 per cent, and is less fluctuating than in any other country. No paper is rejected on account of its smallness. In 1889 there were at the parent bank nearly 20,000 discounts of 10 francs ($1.93) or less each, and more than 1,000,000 ranging in size from 51 to 100 francs.

Branches and Discounts.

The chief points of difference between our banking system and that of France, as regards note issues, are these:

French	American
One bank of issue with numerous branches.	Any number of banks of issue, no branch banks.
Cash reserve fixed by the bank.	Cash reserve fixed by law.
Notes secured by the bank's assets.	Notes secured by government bonds.
Maximum amount of notes fixed by law from time to time.	Amount of notes not to exceed the bank's paid capital.

The following is a condensed statement of the condition of the Bank of France in thousands of francs on April 9, 1908:

Liabilities	Francs	Resources	Francs
Capital	182,500	Gold	2,776,033
Surplus	38,519	Silver	902,513
Circulating notes	4,869,281	Discounts	1,046,796
Deposits	440,000	Advances on securities	541,196
Other liabilities	375,243	Other resources	639,005
	5,905,543		5,905,543

Although the Bank of France has a monopoly of note issues, it has numerous competitors in the field of deposit and discount, the largest being the Crédit Lyonnais with a capital of 250,000,000 and a surplus of 125,000,000 francs. Five such banks have aggregate deposits of 3,424,000,000 francs, sevenfold the amount of the deposits of the Bank of France. The deposits are exclusively in cash or bank notes. Securities cannot be converted into sight deposits, although the bank may undertake their sale and conversion into cash for the depositors' credit when sold. These five banks hold 2,414,000,000 francs of short-time commercial paper, and 883,000,000 francs of advances on securities. This great development of discount and deposit banking in France has taken place mainly during the past twenty-five years.

THE IMPERIAL BANK OF GERMANY

The Reichsbank, or Imperial Bank of Germany, was grafted upon the stem of the Bank of Prussia in the year 1875. Prior to that event there had been five different monetary systems in the Germanic confederation, with a heterogeneous coinage, a variety of legal-tender notes issued by the several governments, and numerous banks whose circulating notes were generally at a discount except at their place of issue. The establishment of a central bank was one of the measures adapted to bring order out of this financial chaos, and it has been successful even beyond the expectations of its promoters. The Bank of Prussia was originally owned by the government, which had contributed its capital of 2,000,000 thalers, but it had grown to 20,000,000 thalers by the admission of private stockholders. The government, however, continued to control it. The German Empire bought the Prussian government's interest, raised the capital to 120,000,000 marks, and disposed of the whole by

Imperial Bank of Germany.

private subscription, — retaining, however, absolute control over it by means of an imperial board of directors, subject to the chancellor of the empire. By the bank act of 1875 the president and the members of the board of directors are appointed by the Kaiser for life, on the recommendation of the federal council. The officers of the bank, although paid by it, are considered government officials, and they are not allowed to hold shares in the bank. The shareholders choose from their own number a central committee, who act in an advisory and supervisory capacity, but receive no salary. The central committee elects three members from its own number to sit with the imperial board of directors in an advisory capacity, and they are authorized and required to inspect the books and accounts of the bank "in the presence of a bank director" and to make reports thereupon to the central committee.

Its Organization.

At the time when the bank act of 1875 was passed there were thirty-two independent banks in the empire which had the right of note issue. The general provisions of the act applied to them as well as to the Reichsbank. They were allowed to issue in the aggregate 135,000,000 marks and the Reichsbank 250,000,000 marks of uncovered notes. It was provided also that, if any of the independent banks should for any reason cease to issue notes, their rights of issue should pass to the Reichsbank. All but seven of them either abjured the right of issue or lost it by expiration of their charters on or before January 1, 1894. The uncovered issues of the Reichsbank have since been raised to 550,000,000 marks, which is called the "contingent circulation."

Note Issues.

Some provisions of the German system are of great importance, and should be compared with the English system, as established by the bank act of 1844. The German law, like the English, requires that, for all note

issues above the foregoing limits, the banks must have an equal amount of cash in their reserves, but it does not require them to hold this cash as a special redemption fund for the notes. Nor is the regulation an inflexible one, like that of the English act. Any bank may exceed the limitation of the cash reserve by paying to the imperial treasury a tax of 5 per cent on the surplus issue, provided that the Reichsbank shall maintain at all times a reserve equal to one-third of its notes in circulation — the other two-thirds to be covered by bills or checks running not more than three months and having at least two indorsements of undoubted responsibility. The tax was originally imposed for the purpose of restricting the note issues, but experience has led to the abandonment of that motive, as is shown by the fact that frequently the rate of interest charged to the borrowers is less than the tax. Each note-issuing bank is required to publish, four times each month, a report of its assets and liabilities, showing particularly the state of its note circulation and of its reserve fund. If the note issues are in excess of the limitations above described, the tax is imposed immediately, and is repeated each week as long as the excess continues. Evidently this system of note issue was modeled upon the English one, but modified by English experience in the crises of 1847, 1857, and 1866, when it was found necessary to "suspend the bank act." To avoid the necessity of breaking the law on such occasions, the German act was made flexible, and has been found to avert trouble in times of severe stringency. It must, therefore, be considered preferable to the English act.

The Elastic Feature.

Imperial Bank notes are now legal tender. At first circulating notes could not be issued smaller than 100 marks ($23.80), but notes of 50 and 20 marks have since been authorized. The Reichsbank is obliged to give its notes in

exchange for gold bullion, and to redeem them in gold coin. Banks may count the notes of other specie-paying banks in Germany and notes of the imperial treasury as a part of their cash reserve. The Reichsbank has hundreds of branches, divided into classes according to the importance of the places where they are situated and the kind of business transacted by them. The rate of interest is uniform at the head office and all branches. The Reichsbank usually redeems its notes at its branches, as well as at its head office in Berlin. The independent banks are required to redeem their notes at an agency either in Berlin or in Frankfort, as well as at their own counters. All note-issuing banks are required to receive, in payments to themselves, the notes of other banks, and must at once present them (except those of the Reichsbank) for redemption, or use them in payments to the issuing bank, or in other payments in the town where it is situated.

Various Provisions.

A law was passed in 1900 to increase the capital of the Reichsbank to 180,000,000 marks by the sale of new shares at 135, the premium to be added to the surplus fund. This increase was effected in 1905.

The annual profits of the Reichsbank are apportioned in the following manner: (1) $3\frac{1}{2}$ per cent on the capital stock goes to the shareholders; (2) 10 per cent of the excess goes to the surplus fund; (3) the remaining surplus is divided between the shareholders and the imperial treasury in the ratio of one-fourth to the former and three-fourths to the latter. If the net profits fall short of $3\frac{1}{2}$ per cent on the capital stock, the residue is to be taken from the surplus fund. Dividends not called for within four years after maturity are to be canceled in favor of the Bank.

Dividends.

The Imperial Bank is required to take charge of the business of the imperial treasury without compensation.

The chief points of difference between our banking system and that of the German Reichsbank are these :

German	American
Bank controlled by government exclusively.	Banks controlled by shareholders exclusively.
Circulating notes secured by bank's assets.	Circulating notes secured by government bonds.
A certain amount of notes issuable without conditions.	Amount of notes not to exceed bank's capital.
Issues over and above the foregoing to be covered by an equal reserve of cash, otherwise a tax of 5 per cent on the excess.	Each bank to keep a deposit in the treasury, equal to 5 per cent of its circulating notes, for the redemption thereof.

The following is a condensed statement of the condition of the German Reichsbank in thousands of marks on May 1, 1911 :

Liabilities	Marks	Resources	Marks
Capital	180,000	Coin,[1] bullion, and notes	1,208,712
Surplus	64,814	Bills of exchange	1,014,707
Circulating notes	1,659,092	Loans on securities	112,039
Deposits	602,785	Loans on goods	2,384
Other liabilities	24,855	Other resources	193,704
	2,531,546		2,531,546.

[1] The first item of the resources consists of gold, 818,106 marks; silver, 316,573 marks; government notes, 63,553 marks; notes of other banks, 10,480 marks.

RECAPITULATION

The Bank of England is a private corporation which renders certain financial services to the government. In consideration of a loan of money Parliament, in 1694, granted it a charter with banking powers, and an annual payment for interest on the loan. The bank paid the stipulated sum to the government and issued its own interest-bearing notes for an equal amount, which were bought by the public. With the capital thus replaced it began the business of discount and deposit. Three years later the bank made a new loan to the government and was authorized by Parliament to issue demand notes payable to bearer for an equal amount. These were likewise accepted by the public at par. In 1709 the government virtually granted to the bank the exclusive privilege of note issue "in that part of Great Britain called England." From that time the indebtedness of the government to the bank, and also the amount of its note issues, increased gradually until 1797, when the bank was forced to suspend specie payments on account of its large advances of money to the treasury for war purposes. The suspension continued until 1821. In 1826 the monopoly of the bank was relaxed, and the privilege of note issue was granted to joint stock banks at a distance of sixty-five miles from London. There were severe commercial crises in England in 1825, 1836, and 1839, and the opinion prevailed that they were caused by excessive issues of bank notes. This belief led to the passage of an act by Parliament in 1844, at the instance of Sir Robert Peel, by which the issue of notes as credit instruments of the bank was forbidden. By the terms of this act the function of note issue was wholly separated from that of deposit and discount, and became an automatic exchange of notes for government securities or for gold. The bank was allowed to transfer to the issue department a

fixed amount of such securities and to receive an equal amount of notes. In addition to this fixed amount, the issue department was to give notes in exchange for gold and not otherwise, and was to redeem all notes in gold on demand. The same principle was applied to all note-issuing banks in England. When the note-issuing privileges of any country banks should lapse, those of the Bank of England were to be increased, on condition that government securities of equal amount were placed in the issue department. In practice this system, which was adopted to prevent panics, has failed to do so, and it has been found necessary in times of great stringency to suspend the operation of the act and to allow the bank freedom to issue notes without the deposit of corresponding amounts of gold. No notes can be issued in England or Wales smaller than £5. The notes of the Bank of England are legal tender at all places in England and Wales except at the bank itself.

The banks of Scotland are distinguished by the great extension and perfection of their branch system and by a kind of loans known as cash credits. There are only eleven banks in the country, but they have all together more than one thousand branches. Every hamlet in the country has at least one office connected with a bank in a large city. At this office, or branch, deposits are received and loans are made with the same facility and freedom, and on substantially the same terms, as in the cities. The branches, however, pay out only the circulating notes of the bank, which are redeemable at the head office. It is unnecessary, therefore, to keep gold at more than one place. A cash credit is an authorization extended to a borrower to draw from the bank, within a certain period of time, a certain sum, or any part thereof, and requiring him to pay interest only for the amounts drawn and for the time they are kept. Cash credits are loans on personal security, not less than two indorsers

being required, frequently three or more. Loans of this kind to farmers are common, and they have been greatly conducive to the agricultural prosperity of the country. Cash credits are economical to the borrower because he pays nothing for his right to draw upon the bank but only for what he actually draws. Interest is allowed on all deposits. The note issues of the Scotch banks are regulated on the same principles as those of the Bank of England. Each bank is allowed to issue a certain amount of notes against its general assets. For all issues above that sum it must have a gold sovereign for each paper sovereign outstanding, but it is not required, as the Bank of England is, to keep this gold separate from its other assets. The gold held by the Scotch banks is usually not more than 5 per cent of their deposits. Each bank has an office in London and a balance on deposit in the Bank of England. The Scotch banks issue notes in denominations of £1 and upward. No bank notes are legal tender in Scotland. There is no system of public inspection or supervision of banks in Scotland.

In Canada there are thirty-five banks. They have a system of branches like that of the Scotch banks, but their note issues are regulated on a different plan. They are allowed to issue notes to the amount of their paid capital, but are required to make arrangements which shall keep them at par in all parts of the country, and to this end they must have at least one redemption agency in each province of the Dominion. Each bank is required also to contribute a sum equal to 5 per cent of its circulation as a common fund to secure the prompt redemption of the notes of failed banks. This fund, held in the custody of the Minister of Finance, is invested in Dominion securities which draw interest at 3 per cent, and the interest is paid to the banks in proportion to their contributions. Note holders also have a prior lien on the assets of failed banks, including the double liability of

the shareholders. The notes of failed banks draw interest at 5 per cent. The safety fund, the prior lien, and the interest clause have been effectual to prevent any depreciation of the notes of failed banks in Canada since those provisions of law went into force. There is no government inspection of banks in Canada, but the incorporated association of Canadian bankers is empowered by law to inspect the note issues of all banks and to keep them within the limitations of the law, with power to punish infractions.

The Bank of France is a private corporation which discharges public functions similar to those performed by the Bank of England. Its affairs are managed by a board of regents chosen by the shareholders. They act, however, under the general direction of a governor chosen from among the shareholders by the chief of the state. The governor has power to veto any act of the regents. He also appoints all employees of the bank. The bank has the exclusive right of note issue in France, and its notes are legal tender. The maximum amount of its issues is fixed by law from time to time. Its metallic reserve is not regulated by law, but is usually 80 per cent or more of its note circulation. In specie holdings it is the strongest bank in the world. The government does not exact any compensation from the bank for the monopoly of note issue, but it imposes a small stamp duty on the notes. The bank suspended specie payments in 1870, during the Franco-German war. The suspension was prolonged, at the instance of the government, till 1878, but the discount on its circulating notes during the greater part of this time was so small as to be scarcely noticed. The bank has a large number of branches and subsidiary offices in all parts of France, where commercial paper is discounted and loans are made on securities. The rate of interest on loans is uniform at the parent bank and at all branches and offices. In its system of note issue

the Bank of France is a conspicuous example of the "banking principle," as the Bank of England is of the "currency principle."

The Imperial Bank of Germany is owned wholly by private shareholders, but is under the exclusive control of the government. Its board of directors is appointed by the emperor, on the nomination of the federal council, and all the officers of the bank are considered as government employees. The directors are responsible to the chancellor of the empire. A committee of the shareholders sits with the board of directors in an advisory capacity, inspects the accounts from time to time, and makes reports thereon to the shareholders. The bank has the right of note issue, — a right which will become exclusive whenever the issues of certain independent banks shall have ceased. The method of note issues is a modification of that of the Bank of England. The bank is allowed a fixed amount of uncovered notes. For all above that sum it must have in its reserves an equal amount of cash, but this is not, like the English law, an inflexible rule. The bank may issue uncovered notes in excess of the prescribed limits, on condition of paying a tax of 5 per cent per annum on the excess, but its reserve must not at any time be less than one-third of its outstanding circulation. This elastic clause has been vindicated by experience. It has afforded relief to the business community in several periods of monetary stringency, and without any harmful consequences. The Imperial Bank is required to give its notes in exchange for gold coin or bullion, and its notes are now legal tender in Germany. All note-issuing banks are required to receive each other's notes at par and to redeem their own notes at Berlin or Frankfort, as well as at their own counters. The net profits of the Imperial Bank are divided between the shareholders and the imperial treasury in a proportion fixed by law. The Imperial Bank has many branches.

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CHAPTER XVII

RECENT HISTORY

It has been the author's aim in the preceding chapters to enable the reader to reach right conclusions in reference to the currency problems now (1911) confronting us.

The principal defect of our national bank system is the rigidity of its note circulation. In a broad sense the volume of notes is regulated, not by the wants of trade, not by the amount or kind of commercial paper offered for discount, but by the market price of United States bonds. Even if the bonds were sufficient in amount and satisfactory in price, the note circulation would still be lacking in the elasticity which should characterize a good system. By elasticity is meant the capacity to increase or diminish in volume in accordance with the needs of the community, and simultaneously therewith. It has been shown in a previous chapter that where note issues are unrestricted the amount of notes outstanding at any time depends not upon the volition of either the banker or the depositor, but upon the public demand. There are some seasons of the year, also, when a greater quantity is wanted than at others, and these familiar ebbs and flows vary in different localities and in different trades. A flexible currency is one which rises and falls in volume harmoniously and simultaneously with these trade movements.

Inflexibility of Note Issues.

Note issuing is, to the banker, simply a question of profit. When he buys bonds and deposits them in the Treasury as security for circulation, he virtually buys notes from the

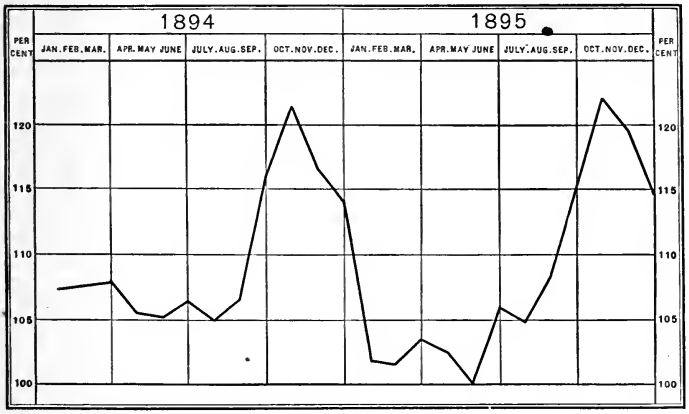
government; and his question is whether he can get more profit by such an investment than by using his capital in other ways. Aside from the interest on the bonds, his gains arise only from the average amount of his notes which the public will take and hold. There will always be some notes in transit to Washington for redemption and thence back to the bank; and after they come home they will remain unused for a while. During this period they are unproductive capital. Therefore the banker will take from the government no more notes than he thinks he can keep in circulation. He will hold none for emergencies. Thus the national bank currency remains for long periods nearly uniform in amount, while in countries where notes are issued according to the "banking principle" there is a seasonal outflow and inflow of notes corresponding to the greater or less demand for them. The contrast between Canada and the United States in this particular is very marked, as appears from the charts on the next page.

Seasonal Demand for Notes.

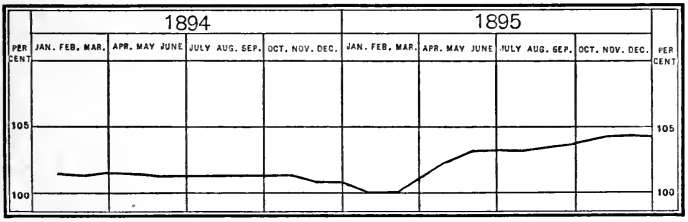
In every country the alternations of seedtime and harvest have a marked influence upon the currency movement. During the spring and early summer, when the farmers are engaged in planting and tilling their crops, they usually incur debt to the country merchants for household supplies; and the currency movement is then sluggish. When harvest comes, a great deal of work must be done within a short space of time, and this requires a large amount of currency to pay the wages of laborers and to meet the various claims against the farmers which then mature. These seasonal demands are imperative. They come almost simultaneously in large sections of the country. Every other demand for currency is secondary to this, since the only time to harvest the crops is when they are ripe.

The annual crop movement in Canada is marked by an uplift of the note circulation, while no corresponding rise is

observable in the United States. What takes place among us is a withdrawal of the cash reserves of the banks and a



NOTE ISSUES OF THE CANADIAN BANKS



NOTE ISSUES OF THE NATIONAL BANKS OF THE UNITED STATES

transference of the same from the commercial centers to the farming districts, causing a contraction of loans and discounts to a much larger amount than that of the cash so withdrawn. A reverse movement takes place after the crops are moved. It is the opinion of good judges that these alternate contractions and expansions exceed two hundred million dollars in both instances. No such unsettlement of bank reserves takes

Unnecessary Contraction and Expansion.

place in Canada because the banks can issue their own notes without cost in the autumn and retire them without cost after they are sent home for redemption.

When proposals were made in 1892 and succeeding years for a bank-note circulation based on the assets of the banks instead of government bonds,[1] one of the reasons advanced for the change was that with the extinction of the national debt the bond security of the notes would be withdrawn and that the existing system would necessarily come to an end.

At that time nobody had conceived the idea of extending a public debt already matured if the government had the money with which to pay it and stop the interest. Nobody would have dared to propose it, for at that time the national finances were the leading issue in politics. But new political issues arose. The Spanish War came. The public mind was no longer centered on finance. So the men in authority, who ought to have foreseen the coming crisis and made plans for bank circulation on some other basis, extended a large part of the maturing public debt for thirty years, although they had the money in hand, or in sight, to pay it off and stop the interest.

In preparation for this step Congress passed the act of March 14, 1900, authorizing the Secretary of the Treasury to refund the outstanding debt maturing in 1904, 1907, and 1908 into new bonds to run thirty years, bearing interest at 2 per cent per annum. Prior to the passage of this act it had always been the policy of the government to pay its interest-bearing debts as soon as possible, in order to avoid unnecessary burdens upon the taxpayers. To this end bonds redeemable at the

Extending the Public Debt.

[1] One such proposal was made by the American Bankers' Association at its annual meeting at Baltimore, in October, 1894. Another was made by the Secretary of the Treasury (Hon. John G. Carlisle), in his annual report of that year.

pleasure of the government after some short period were generally preferred. Thus the 5-20 bonds issued during the war were made redeemable at any time after five years but payable at the end of twenty years. Under this system the Treasury could use its surplus revenues to pay bonds at par instead of buying them in the market at a premium, and the money would be restored to the channels of business promptly.

How this change of policy was carried into effect was shown in the Treasury report for 1904, in the following tabular statement:

	3 PER CENTS	4 PER CENTS	5 PER CENTS	TOTAL
Amount refunded into 2 per cent consols of 1930	$119,260,000	$351,578,000	$72,071,300	$542,909,960
Interest saved on old bonds to maturity	27,283,662	89,852,710	13,050,355	130,186,727
Interest to be paid on new bonds to maturity of old bonds	18,189,108	44,926,355	5,220,142	68,335,605
Premium paid for old bonds . .	6,239,833	36,432,250	6,872,572	49,544,655
Premium received for new bonds .	407,606	1,513,778	. . . .	1,939,384
Net profit . . .	3,262,327	10,025,883	957,641	14,245,851

In this way the policy of the government was reversed, and nearly $550,000,000 of the public debt was put beyond the chance of extinction for nearly a quarter of a century, except by purchase in the open market. For the privilege of making this swap the government paid a bonus of nearly

$50,000,000 on the old bonds, of which it recovered less than $2,000,000 as premium on the new ones.

The foregoing tabular statement purports to show a net profit on the refunding operation by ignoring the interest (amounting to $257,837,642) on the new bonds after the maturity of the old ones. After deducting the apparent profit shown above ($14,245,851), the loss on the whole transaction is enormous, but we cannot reduce it to exact figures, because we do not know how much of the extended debt we might have paid off if it had not been thus extended. We know, however, that a surplus of $240,000,000 was on hand in 1907, and that the interest on that amount might have been extinguished. Of course the premium on the maturing bonds would have extinguished itself.

The 4 per cent bonds of 1907 were not all included in the list embraced in the Treasury report quoted above. Some of them were left to run to maturity (July 1, 1907), so that they might be paid if the government should then have the money in hand. The government did have the money, but instead of applying it to that purpose, $50,000,000 of bonds were extended for twenty-three years at 2 per cent interest, and the money which might have been employed in payment of debts was deposited in banks. The interest which the government is thus obligated to pay, and which it might have wholly saved in this instance, was $23,000,000 — literally cast away by a stroke of the pen.

Loss of Interest.

The excuse for this kind of financiering was that if the government's interest-bearing debt were paid, there would be a shortage of bonds to be held as security for national bank notes. If that is a good reason for keeping $240,000,000 of bonds alive when the government has the money in hand to pay them off, then the same reasoning would justify the selling of new bonds when there is no use for the money

which they bring in except to deposit it back in the banks. And that is what the Secretary of the Treasury did in November, 1907. Leaving out of account the money paid for the bonds and redeposited in the banks (as equal quantities on the opposite sides of an equation cancel each other), this is a case where the United States, in its capacity as a government, gives the banker its note bearing semi-annual interest, and payable at the end of thirty years and not before, and in its capacity as a body of citizens takes in exchange the banker's note payable without interest at no particular time. But even this device of extending a debt and continuing needlessly to pay interest on it will not suffice much longer, since population and trade are growing more rapidly than our financiers can add to the public debt. Hence the proposal to use other bonds than those of the government as security for national bank notes.

Bad Financiering.

In 1902 the Secretary of the Treasury (Hon. Leslie M. Shaw), finding the element of elasticity wanting in our currency system, sought to supply the defect without any change in the law. He first made a rule changing the security required for the deposit of government money in national banks. By the terms of the law this security was to be "United States bonds *and* otherwise," the word "otherwise" having been inserted, as the debates of Congress prove, in order to include the personal bonds of the bank's officers. No record could be found of any deposit having ever been made in a bank on any other collateral security than United States bonds, until Mr. Shaw decided that the word "and" was equivalent to the word "or." State and municipal bonds were accepted under the new rule. In making the announcement of this change of practice, however, the Secretary stipulated that any government bonds

Secretary Shaw's Policies.

Various Bonds as Security for Government Deposits.

released as security for deposits should be used as security for additional bank notes, and in this way an artificial stimulus was applied to the taking out of new circulation. Two years later the Secretary added railroad bonds to the list of securities acceptable for deposits.

Simultaneously with the foregoing rule Secretary Shaw made another which released the national bank depositaries from the requirement of keeping a cash reserve against government deposits. Although the law requires the reserve to be held by each bank against "the aggregate amount of its deposits," the Secretary argued that the government was abundantly protected by the securities held, and hence that a cash reserve was, in this case, a superfluity. The New York Clearing House took the view that the law could not be repealed by the Secretary, and hence that its members should continue to maintain a reserve of 25 per cent against all deposits, including those of the government. The act of Congress of May 30, 1908, however, repealed the reserve requirement as to government deposits.

No Bank Reserve against Government Deposits.

In 1903 Mr. Shaw made a fresh ruling, that national banks which have been designated as depositaries of public money are branches of the Treasury, and hence that public funds may be transferred to or from such banks at any time. This rule is of no importance except as showing the drift of the Secretary's mind and his purpose to get the public funds into shape, to be expeditiously moved hither and thither for what he considered to be the advantage of trade and commerce from time to time.

In 1896 there was an international movement of gold toward this country, which Mr. Shaw thought needed to be accelerated. He accordingly notified two New York banks privately that if they would engage gold for importation he would deposit an equal amount of the metal in their vaults

so that they should not lose the interest during the time of transit from the foreign port to the United States, and a few days later he gave public notice that he would do the same for other depositary banks. This announcement lowered the gold import point and hastened the arrival of the amount of metal which the conditions of international trade called for, but did not increase the amount in the aggregate. It had the effect also of giving the depositary banks an advantage over all other persons, firms, and corporations engaged in the business of importing gold.

Stimulating Gold Imports.

In the same year the Secretary made such arrangements for moving the crops in the coming autumn as he thought would avert the usual autumnal pinch. He withdrew $60,000,000 of public money from the banks and locked it up, in order to have a supply to put out again in the harvest season. On September 27 he announced that $26,000,000 would be put in the banks to relieve the money market, but that it should not be used to foster speculation in the stock market. It would be widely distributed far from the purlieus of Wall Street, among the banks of the West and South. In spite of this elaborate plan of campaign the speculators had the best of it.[1]

Moving the Crops.

In his annual report for 1906 Mr. Shaw expressed the opinion that the Secretary of the Treasury ought to be clothed with full power over the bank circulation, so as to expand or

[1] "Notwithstanding his announcement as to the distribution of the deposits, it soon appeared that probably half of the $26,000,000 had found a resting place in the banks of New York. Amounts at first offered to banks in other cities were declined, because the banks could not supply the required collateral, and other deposits actually made in interior cities were reconsigned to New York because of the higher rates of profit there prevailing." — "The Treasury and the Banks under Secretary Shaw," by A. P. Andrew, in the *Quarterly Journal of Economics*, August, 1907.

contract it at his own volition. Also that he ought to have authority "to require all banks, at certain times fixed by him, to slightly and gradually increase their reserves and hold the same within their own vaults, with corresponding authority to release the same from time to time, as in his judgment will best serve the business interests of the country." He did not claim as his exclusive possession the omniscience needed for the exercise of such powers, but generously conceded it to all his predecessors and all his successors in office. Shortly after writing this report he ceased to be Secretary of the Treasury.

Omniscience in the Treasury Department.

All of the acts above enumerated were either violations of the statute law or assumptions of power never contemplated by the law makers. They were glaring examples of "paternalism in government," which assumes that the holders of public office know how private business ought to be conducted better than business men themselves, and think that their powers ought to be made commensurate with their superior knowledge. The natural and immediate consequence of Mr. Shaw's action was that the speculators in Wall Street cast prudence to the winds and clamored for "Treasury relief" whenever their own speculations had produced tightness in the money market.

CHAPTER XVIII

THE PANIC OF 1907

EARLY in October, 1907, there were signs of trouble in the New York Stock Exchange. Prices of securities fell with great violence. On the 16th there was a crash in the market, started by the failure of certain speculators in copper-mining stocks. Public attention was thus directed to a group of banks in the management of which these persons were influential. These banks fell under suspicion and the rumors extended to other speculators and banking institutions supposed to be affiliated with them. On the 21st the National Bank of Commerce announced at the clearing house that it would no longer be responsible for checks drawn on the Knickerbocker Trust Company, one of the largest, and perhaps the most conspicuous, of the financial institutions of the city. On the following day there was a run on it by depositors, and it closed its doors after paying $8,000,000 over its counter.[1]

The Knickerbocker Trust Company.

With the failure of the Knickerbocker Trust Company the panic became general. Prominent bankers held a meeting at midnight to take measures to stop it, and the Secretary of the Treasury, Mr. Cortelyou, came from Washington and promised to assist.

On the 23d a run on the Trust Company of America began, and the bankers gave it assistance so that it was able to pay out $13,000,000 in cash in one day without closing its doors.

[1] The Knickerbocker Trust Company was resuscitated after the panic by new subscriptions to its capital stock.

On the same day a run was started on the Lincoln Trust Company, but was successfully met. There was a renewed and heavy break on the stock exchange, and the rate for call money rose to 90 per cent; time loans could not be had on any terms. The Westinghouse companies of Pittsburg were placed in the hands of receivers for inability to meet maturing obligations.

The Run on Other Trust Companies.

October 24 the panic reached its height; call money was not obtainable. A bankers' pool was organized to deal with the situation. By offering $25,000,000 at 10 per cent they broke the deadlock. Secretary Cortelyou deposited $19,000,000 in the banks. The run continued on the two trust companies, but all demands were met.

During this time there had been a heavy drain on the New York bank reserves from banks in other parts of the country. On the 26th the clearing house decided to issue loan certificates in the mode prescribed in the panic of 1893. This was virtually a general bank suspension, but while most of the banks used their discretion either to pay checks presented at their counters in cash, or to stamp them "good through the clearing house," several of them paid all checks presented without any discrimination whatever. The example of New York was followed almost instantaneously by all the clearing houses of the country, including that of Chicago, which had never before issued a loan certificate. A premium on currency made its appearance on November 2, as in the panic of 1893, and the various devices employed in that year for paying wages and carrying on retail trade by means of small certificates and pieces of stamped cardboard, were repeated everywhere. The premium on currency increased gradually to 4 per cent, as quoted in the newspapers, but in fact it reached 5 and 6 per cent in some instances where large sums

Drain on Bank Reserves.

were imperatively required. This was a case where wholesale prices were higher than retail. The exchanges of the country were thrown into confusion. On October 29 Chicago drafts on New York were quoted at $2.50 per $1000 discount. In other places the usual country balances in New York had been so far drawn down that the banks in the interior, although having plenty of cash in hand, could not sell drafts on New York at all.

Premium on Currency.

It happened that we had been blessed with an abundant wheat harvest, while there had been a shortage in all European countries except France. The price of wheat was accordingly the highest that had been known for several years, and the export of this staple gave our bankers an abundance of commodity bills with which to command gold abroad. Sterling exchange fell to 4.82 on October 26, and to 4.80 on October 28, on which day $18,750,000 in gold was engaged in London for importation. This movement continued until December 23, during which time $107,000,000 in gold was imported, all of which was paid for with exported grain and cotton. During a part of this movement the quotations for demand sterling were above par (4.86.6), and even went as high as 4.91, so that some people said we were buying gold at a premium. But the quotation 4.91 was not a quotation of cash, but of bank checks that were selling in Wall Street at about 96 cents on the dollar. The premium on currency continued until the last of December. During this interval of two months foreign bills of exchange drawn on American houses, banks, or corporations were of uncertain value. They might be paid at par or at varying rates of discount according to the will of the debtor. Interest due on bonds and other obligations held abroad was subject to the same uncertainty, for although legally payable at par, few creditors could afford to lose time

Importation of Gold.

and hire lawyers to bring suit to recover the difference. This was the most humiliating feature of the panic. It justified the saying of a foreign critic that the United States was "a great international financial nuisance."

On November 17 announcement was made at Washington that the Treasury would come to the relief of the business community by issuing $50,000,000 of Panama canal bonds, and $100,000,000 of one-year 3 per cent certificates of indebtedness. As both of these operations contemplated the borrowing of money from a market already staggering with the demands upon it, the promised relief was never experienced. The design of the President and Secretary was to issue a security which, by the offer of 3 per cent interest, would draw hoarded money out of its hiding places, and also to increase the amount of 2 per cent bonds in the market which could be used as security for national bank notes. There was a brief spurt on the stock exchange when this plan was promulgated, but on the next day the depression was as great as before, and on the three following days it became still greater. Critics said that the proposed issue of certificates was not authorized by law, and that the proposed issue of bonds, if lawful and successful, would be a fresh drain on the cash reserves of the banks which could not be recouped in months. Announcement was subsequently made that 75 per cent of the subscriptions for 3 per cent certificates would be allowed to remain as deposits in the vaults of the subscribing banks and 90 per cent of the subscriptions for Panama bonds. On that basis $25,000,000 of Panama canal bonds were sold and $14,086,500 of 3 per cent certificates. Banking opinion was nearly unanimous that the government's intervention had not been helpful, but the contrary.

Action of the Government.

The cause of the panic was the existence of a large number of debts that could not be paid at maturity. Some debts

are maturing all the time that cannot be paid. These cause a small crisis in each case, but it is noticed only by the individuals immediately concerned. If all persons who are in debt could pay their obligations when they fall due, there could be no financial crisis, large or small. The cause of an excessive amount of debt that cannot be paid, must be sought in the varying conditions of trade, which are simply the indices of varying states of the public mind.

Cause of the Panic.

There are periods when all or nearly all men in business are very hopeful and enterprising. They are then apt to extend their business and take risks. They are eager to borrow money, purchase goods on credit, enlarge their works, buy more land, erect new buildings, buy stocks on margin, — in other words, to speculate. The prices of the things bought are forced up by the competition of buyers, but the necessity always exists of paying for the things purchased and meeting the obligations incurred in terms of gold dollars.

A time comes in the upward rush when this cannot be done because the prices are too high. Then the speculators begin to fail. Those whose liabilities are largest in proportion to their capital fail first. Their failure brings down others, who, in ordinary times, would "pull through," even though they might incur losses through improvident ventures. Presently the whole business community perceives a danger impending — the danger that any person owing money and not having it in his immediate possession may not be able to get it. This starts the panic.

Perhaps the most striking phenomenon of the panic was the rush of the country banks to draw their money out of the central reserve cities, where the bulk of it was held. This proves that there is much human nature in bankers, but it proves even more conclusively that our banking system is behind the age and needs betterment.

CHAPTER XIX

THE STOCK EXCHANGE AND THE MONEY MARKET

SHORTLY after the panic of 1907 began, a rumor became current that "Wall Street" had designedly caused it in order to depress the prices of stocks, to frighten weak holders, and to profit by the ruin of the community. This conception was erroneous, but it derived plausibility from the fact that stocks had taken a sudden and violent downfall without any apparent cause and that this fall continued increasingly from day to day. The immediate cause was the simultaneous selling of securities by holders in all parts of the country, and in Europe also, who perceived that there was trouble impending and who wanted cash to meet maturing obligations. There were more sellers than buyers at the prices prevailing on the stock exchange at any given moment, and that fact caused the decline. The remoter cause was a long course of over-speculation, not only in stocks but in nearly all kinds of property here and elsewhere.

The Stock Exchange Panic.

The relations of the stock exchange and the money market to each other are primarily those of the promoter and the investor, and secondarily those of the borrower and the lender.

The distinction between money and capital should first be noted. Capital consists of all the goods in the world that are subject to sale and transfer. Money is an instrument of exchange, the possession of which gives the owner command of capital at the prices prevailing at any given time. The supply of capital is, in the nature of things, limited.

Distinction between Money and Capital.

Both the production and the consumption of capital go on at all times. The excess of production over consumption forms new capital available for the creation of additional means of production, from which income may be derived. The owners of this excess may themselves apply it to this purpose, or transfer it to others. Ordinarily an easy money market means that the demand for capital is not in excess of the supply. Conversely, a tight money market means that the demand has overtaken the supply and that men are bidding against each other for the possession of it; the competition of bidders causes general prices and the rate of interest to rise.

The Stock Exchange as a Promoter.

The function of the stock exchange as a promoter of new enterprises consists of its great clientage of buyers, of its facilities for advertising securities, and of its reputation for carefulness in scrutinizing applications for admission to its list. Its buyers are practically innumerable in both hemispheres. Its quotations are published free of cost in nearly all daily newspapers. No enterprise is admitted to its trading list without previous examination by a committee of experts. While the exchange does not guarantee the goodness of any security, or even the truthfulness of the statements filed by its managers, it requires the filing of such statements prior to admission, and at stated intervals thereafter, and it inflicts summary punishment for any breach of good faith therein. Thus the fact of admission to the list becomes *prima facie*, although not conclusive, evidence of the character of the investment.

The money market consists of all the loanable funds in the country. The money which people are using in their daily business, which passes from hand to hand in retail trade, is no part of the money market, because it cannot be recalled from the immediate service which it is rendering

to society. The bulk of loanable funds of the country consists of bank credits which are bottomed on gold; and the magnitude of such credits is limited by the amount of "lawful money" held by the banks as reserves. Bank notes are not available as reserves of national banks, although they are such for state banks and trust companies. Any attempt to enlarge the loanable funds of the banks by "taking out" bank notes not needed for hand-to-hand circulation would be checked by their prompt return for redemption in lawful money.

What the Money Market is.

The most common function of banks, as we have seen, is the discount of commercial paper running for short periods of time and representing actual transfers of property in the business world. In this way the bank exchanges its well-known credit for the less-known credit of merchants and manufacturers. An ideal condition for a bank is one wherein the supply of good bills is sufficient to absorb all of its loanable credit, and where the inflow of cash from maturing ones is equal to the outgo of new ones. There is always some difference, however, in the character and quality of bills offered for discount, and when the amount of acceptable paper is less than the amount of the bank's loanable funds, advances may be made on goods or securities that are readily salable in the market. In this way interest is earned on money that would otherwise remain idle. In the event that securities of this character are not available at home the banker may place his surplus funds as deposits payable on demand in some other place where such securities are bought and sold. Usually a low rate of interest, say 2 per cent, is allowed on such deposits.

Advances on Securities.

The piling up of these deposits in the banks of New York lowers the rate of interest on call money and incites speculation. If Union Pacific, for example, pays dividends of 10

per cent and is selling at 170 or under, it yields 5.6 per cent on the purchase price. If the purchaser can borrow money on call at 1½ per cent, as frequently happens, he gains a profit of 3½ to 4 per cent as long as such conditions continue. Speculation thus started may run a considerable time and draw in a large number of participants and extend sympathetically to the whole list. Speculators may bid up the price of stocks, and the rate of interest at the same time, until a climax is reached. Then a reaction will come, stocks will fall, margins will be exhausted, speculators will be sold out, banks may fail, liquidation will pursue its inexorable course, until a *tabula rasa* is made, upon which a new cycle of inflation and collapse may take its start.

A Cycle of Speculation

The essential difference between the two methods of employing a bank's resources is that discounted bills are always bringing in the means of payment of the banker's liabilities, while loans on collateral, whether payable on call or at a fixed time, depend on the sale of the securities, the selling of which may be restricted, or prevented altogether, by the lack of buyers in the market.

The stock exchange is a meeting place of the buyers and sellers of invested capital; that is, of incomes present or prospective. Capital is the result of saving. If not the parent of civilization, it is the indispensable promoter and handmaid of it, since capital gives mankind the leisure and the means to take new steps forward in solving the problems of human existence. It is desirable that there should be facilities for investing the savings of the people without serious delay. Such facilities promote saving. It is desirable also that investments should be reconvertible into cash without delay. The *raison d'être* of a stock exchange is to supply a place where money can be invested quickly and recovered quickly, or upon which the investor can borrow money

immediately if he so desires. It is an incidental advantage that the stock exchange informs all investors, and intending investors, daily and without cost to themselves, of the prices at which they can buy or sell the securities on the active list of the exchange. These prices are made by the competition of buyers and sellers in the market, who are acting under the spur of self-interest. There is no other way in which true prices can be made. If the quotations so made are not precisely the truth in every case, they are the nearest approach to it that mankind has yet discovered.

The gross amount of negotiable securities admitted to the New York Stock Exchange is upwards of $25,000,000,000. The sales of securities on the exchange during the calendar year 1909 were upwards of $20,000,000,000 cash value. Such figures are like the distances of the fixed stars; the human mind fails to grasp them.

Under the rules of the stock exchange every trade made on the floor must be settled and completed within twenty-four hours, unless otherwise specified; *i.e.*, the seller must deliver the thing sold, and the buyers must pay for it in full, at or before 2.15 P.M. of the day following the transaction. All but an insignificant part of the trading on the exchange is of this kind. If all the purchasers should pay in full with their own money, there would be no resort to loanable funds. But probably nine-tenths of the transactions are speculative. In such cases a portion of the money, say 10 or 20 per cent, is supplied by the buyer, and an equal sum by the broker who makes the purchase, and the latter borrows the remainder from a bank, giving the stock or bonds so bought as security for the loan. The amount advanced by the purchaser is called the margin, and there is always an agreement, express or implied, that the margin shall be kept good in case the market price of the securities declines. If the purchaser fails to

Buying on Margin.

respond when called upon for more margin, the broker may sell him out. The bank exercises the same privilege as against the broker. The bank may call upon the broker at any time and without assigning any reason. The percentage of the margin that may be required is a matter of bargain between the parties.

Loans to Brokers.

The making of bank loans to stock brokers is bottomed primarily on the confidence which the banker has in the broker as a person, and secondarily on the goodness of the securities offered. The *modus operandi* is substantially this : The broker, knowing from his clearing sheet of yesterday what payments he has to meet to-day, obtains from his bank in the morning authority to draw for this aggregate amount at an agreed rate of interest. As his checks come in during the day the bank certifies them and the broker sends to the bank securities whose market value is greater by a certain margin than the amount borrowed.

These loans are usually payable on call. As national banks are forbidden by law to certify checks for a sum greater than the drawer of the checks has on deposit, the practice in such cases is for the broker to execute a promissory note, which note the banker discounts, putting the proceeds to the credit of the broker, and attaching the security to it as it comes in during the day. While this method exposes the banker to some danger of loss in the interval between the certification of checks and the receipt of the securities, such losses seldom occur. There is an unwritten rule of the stock exchange that the bank must be protected at all hazards, both as a matter of personal honor and because the stock-brokerage business cannot be carried on otherwise.

The relations of the stock exchange and the money market as borrower and lender are by no means as simple as they seem. The twain are gigantic bodies which act and react

upon each other like planets revolving around a common center. It is a problem of great complexity to find the causes of the conditions prevailing at any time.

Periods of confidence and periods of depression come and go in undulations. The business world has had its ups and downs, not exactly with regularity but with something approaching it, during the past three centuries. The essential factor and prime cause of a commercial crisis is speculation leading to inflated prices and the piling up of debts based upon such inflation, which the debtors cannot pay. The crisis of 1907 was of this kind. There is no evidence that the crisis was due in any special manner to stock speculation. Doubtless stock trading ran *pari passu* with other trading — it generally does. The inflation which prevailed generally did not avoid the precincts of the stock exchange, but that institution was not a sinner above others. It was the most conspicuous sufferer, however. More columns in the newspapers were given to it, more eyes were turned upon it, than upon any other. So when the rate of interest went up momentarily to 125, there was a shock in the financial world. But the plight of the man who paid 125 per cent over night or for a few days, in order to avoid a greater loss, was not so bad as that of the merchant or manufacturer, who could not get his paper discounted at all. The benevolent usury law prevented him from paying more than 6 per cent, and there was no money to be had at that rate on a commercial basis, — none except as a matter of favor.

Ups and Downs of Speculation.

Banks find it for their interest to take care of their regular customers in times of panic, but they have the right to discriminate, and they exercise it. The temptation of 125, or even 25, per cent is not easily resisted. Here the stock exchange exercises an influence on the money market. It can draw money from the banks that ought to be at the service

of productive industry, since money tends to go to places where the highest reward is offered for it. The country banks must keep some balance in the city banks for the convenience of their customers. They are allowed to keep three-fifths of their legal reserve in a city bank. The law lends its influence to this extent to the piling up of money for the use of stock speculators. This system is sometimes fraught with danger, and the question has been under debate for half a century whether the payment of interest on deposits ought to be allowed at all.

Interest on Deposits.

How to prevent it is a question perhaps even more difficult of solution. If national banks were forbidden to pay interest on deposits, the prohibition would not extend to the state banks, trust companies, and private bankers. These would pay interest for the surplus funds of the country banks, and the national banks would thus be at a disadvantage. If the country banks in the national system were not allowed to keep three-fifths of their reserves in the city banks, they would compete at a disadvantage with the state banks in their own localities. Thus the advocates of prohibition of interest on deposits always come to an *impasse*, and the old system continues. It continues because it has an economic basis. The fact that there may be a general crisis, say once in every ten years, and a spasmodic grab for bank deposits, is a problem by itself, which may be open to more than one solution. Any arrangement which should quiet the fears that lead to the grabbing of deposits would effect a cure of this disorder. This end is secured in most European countries by means of a central bank of issue.

The relations of the stock exchange to the money market as a borrower are of the same nature as those of the produce exchange and of the cotton exchange. The only difference is in the magnitude of the transactions. The stock exchange

is so large, its borrowings at times so colossal, that they affect the money supply of the world and are capable of absorbing the last dollar that can be tempted from the vaults of banks or the pockets of individuals in both hemispheres. This absorption may take place by the rise of prices of the securities traded in, or by the quantity offered, or both. Usually the demand for money is most imperative when the prices are highest and the trading most active. The question whether this condition is an evil, is in effect the same as asking whether speculation is an evil. Upon this point Governor Hughes's committee on speculation in securities and commodities in 1909 reached the conclusion that to some persons it is an evil and to others not, and that there is no way to prevent it without putting an end to trading altogether. It should be added that speculation has a steadying effect on the market prices of both securities and commodities. To banish it would be to banish nine-tenths of the business, in which event the fluctuations in prices would be greater, and the work of the manipulator more facile and dangerous, than now.[1]

Is Speculation an Evil?

[1] See article, "Shall Speculation be regulated by Law," by Henry C. Emery, in the *Journal of Accountancy*, April, 1908.

CHAPTER XX

PRESENT PROBLEMS

THE panic of 1907 directed public attention sharply to the currency question as an unsolved problem, and it soon became apparent that there was a preponderance of opinion among the commercial classes in favor of "asset currency." The supporters of the latter system, as opposed to the existing bond deposit system, hold that a bank note is the same in principle as a deposit payable on demand, and that the same percentage of cash reserve that suffices for the one will suffice for the other. They maintain that the assets, *i.e.*, the short-time and constantly maturing obligations of the bank's customers, are a better basis for the prompt redemption of all of the bank's obligations than any long-time securities, and that asset currency adjusts itself automatically to the public demand and hence is an elastic currency.[1]

State of Public Opinion.

Many commercial bodies took action on the currency question after the panic came, but two important ones began to investigate it in a systematic way, earlier, — the New York Chamber of Commerce and the American Bankers'

[1] Mr. Alexander Gilbert, president of the New York Clearing House, testified before the House Committee on Banking and Currency, April 13, 1908, that his bank made loans of $25,000,000 to $30,000,000 on commercial paper in 1907, and that the losses on such paper for fifteen months (to April 1, 1908), including the whole of the panic, had not exceeded one-fifth of one per cent. In this computation he had reckoned as losses all paper not paid at maturity, although a large percentage or even the whole might be eventually collected. New York City bonds had declined in the same period 13.3 per cent.

Association, — both of which decided in favor of an asset currency, with some differences of detail. The former preferred a central bank if such an institution were feasible, but evidently did not consider it practicable in a political sense. The latter prepared a bill for an asset currency and forwarded it to Congress for consideration.

The prime defect of the existing system is the requirement that the bank shall purchase its circulating notes by depositing an equal or greater value in the Treasury beforehand. In this way the element of credit is expunged, and the only benefit remaining is the greater convenience in carrying and handling paper instead of metal. After the notes are bought a loss can be avoided by the banker only by keeping them in circulation. He receives only 1½ per cent interest on his deposited bonds after paying the circulation tax.[1] The moment the notes come back to him they begin to burn his pocket. The Canadian banker loses nothing by locking up his circulating notes after the demand slackens, since they did not cost him anything in the first instance.

Defect of the Bond Deposit System.

For the foregoing reasons our banker will not take out more notes than he thinks he can keep in circulation all or nearly all the time. He will not provide himself with a surplus for harvest time or other emergencies. Such a currency cannot be elastic. It will be just as rigid and inelastic when based upon state and municipal bonds as it is now.

The question may be asked, Why did we have a panic in the autumn of 1907, and a general bank suspension lasting two months, while no other country was thus afflicted, and

[1] The comptroller of the currency, in his report for 1907, shows that the banker's profit on circulation, after deducting all expenses, is only 0.95 per cent in excess of the profit he could get by lending at 6 per cent the money invested in the deposited bonds.

even our neighbors in Canada avoided the cataclysm? The trade conditions of Canada were akin to our own, if not worse, and she is now suffering the consequences of speculation and trade reaction, but without becoming like ourselves "an international financial nuisance." The reason is not far to seek. Canada has a credit system under which the banks have no motive for depleting each other's reserves. There are thirty-five banks in the Dominion, with 1841 branches, situated in 1016 towns. None of the branch banks can make a run on its parent bank. None of the parent banks would make a run on the others even if it could, because a common interest binds them together, and they are not too numerous to have a common understanding. As they do not make runs on each other the public do not make runs on them. In England, France, Germany, and the other European countries, the bank reserves are even more scientifically guarded and husbanded. The ultimate cash reserve in each country is in one central bank.[1] No inferior bank in any crisis will draw more from the central bank than it really needs. No individual will draw from it more than he wants to-day, for fear that he may not be able to get it to-morrow or next week. What happens among us when a panic

No Panic in Foreign Countries in 1907.

[1] Mr. F. S. Mead, in the *Quarterly Journal of Economics* (May, 1907), gives a computation of the ultimate cash reserves held in the United States, Canada, and Great Britain, consolidating the institutions of all kinds, in each country, that do a banking business. Thus the banks in the United States, national, state, and private, are treated as a whole, the deposits which they make with each other being eliminated. The liabilities of the banks to the public, including that of circulating notes and government deposits, in November, 1906, were approximately $9,945,615,713, and the cash in hand, $969,904,523 or 9.73 per cent. But assuming that $25,000,000 of the reserves of state banks and trust companies consisted of national bank notes which cannot be termed cash, the reserve would be reduced to 9½ per cent. The national banks alone held 13.39 per cent against individual and

comes was thus described by a witness of all the panics that have visited us since the New York Clearing House was organized:[1]

By far the largest cause of currency hoarding is the fact that the banks throughout the country all proceed to fortify themselves. There are 6600 national banks, all of them outside of New York, hoarding centers, — I will not say all of them, but the majority of them, hoarding centers, — dominated by an idea of self-preservation, each seeking to fortify its own reserves. And why is that? Simply because there is no central agency of relief to which they can apply for help in time of trouble. Every banker feels that he must stand alone.

These facts emphasize the advantages of a central bank like those of Europe, or a system of branch banks like those of Canada and of Scotland, as a preventive of bank suspension. But in every case where branch banking has achieved great success it has been coupled with substantial freedom of note issue. However useful it may be as a means of economizing cash reserves, it is still more so as an instrument of credit. A Scotch bank with one hundred branches does not divide its cash reserve into one hundred parts. It lends its notes at the branches and

Branch Banks.

government deposits and circulation. The state banks and trust companies held 6.35 per cent and the private banks 5.24 per cent.

The reserves of the Canadian banks against circulation and deposits at the same period (1906) were 9.09 per cent cash in hand, but 10.88 per cent if we count, as is proper, their deposit balances in banks in foreign countries.

The ultimate banking reserve of Great Britain was found by Mr. Mead to be 7.6 per cent, counting Bank of England notes as cash, or 6.5 per cent in specie alone. The reserve of the joint stock banks was only 5.5 per cent in specie and bank notes together, or 3.8 per cent in specie alone.

[1] Testimony of Alexander Gilbert before the House Committee on Banking and Currency, April 13, 1908.

redeems them at the head office. A multiplicity of reserves is dispensed with, local redemption is unnecessary. Economy of capital, of time, and of labor are here conjoined, but this would not be possible without practical freedom of note issue. A Canadian bank may receive deposits in Halifax to-day and lend them in Winnipeg to-morrow, because it can issue its notes promptly at the latter place. If it were obliged to wait till it could transmit the money from Halifax by express, time and interest would be lost. If it could not issue its own notes without first buying bonds, lodging them in a government office, and "taking out" currency, the entire profit of the loan might be dissipated.

Their Relation to Note Issues.

The questions whether the law ought to fix a minimum cash reserve for banks, and if so what the reserve should consist of, are occasionally brought into debate. The United States is the only country which requires a fixed percentage of reserve and this is only for national banks. Ordinarily, however, the national banks keep a larger reserve than the law prescribes, and the country banks frequently keep a larger percentage than those of the cities, although their legal requirement is less. Therefore it cannot be said at the present time that the law is a hardship to any class. Among thousands of banks scattered over a wide territory there will always be some reckless or ignorant or unprincipled managers who, in their eagerness for profit, will allow their reserves to fall below the danger point. In other kinds of business the penalty of bankruptcy is the most fitting end to recklessness in business, but in the banking world a fire once started is apt to spread rapidly. One failure begets others and may bring ruin upon a whole community. Therefore the legal reserve provision of our national bank act must be considered wise under present conditions.

Legal Cash Reserve.

Should a bank be allowed to count the notes of other banks as a part of its cash reserve? Nobody would think of allowing a bank to count its own notes, which are its debts, as a part of its cash. Obviously, then, it would not be wise to allow two banks to count each other's notes as reserves. Such a result might be achieved by simply exchanging notes, and then they might report full reserves when they had no real cash at all. This would be an infraction of law, but if there were sufficient motive for it, ways for concealing it could be easily devised. Indeed, it is a common belief among bankers that the reserves consist in part of national bank notes now, which are included in the mass of reserves in order to avoid the trouble of sorting them out and sending them to Washington for redemption. It is most desirable that they should be so sent, since it prevents stagnation of the note currency. It compels each bank to keep its assets in a liquid state, so that it may always have the means of redemption in legal tender at hand. Under the Suffolk system the bank notes of the New England states were redeemed, on the average, ten times each year; and there can be no doubt that the spur of frequent redemption was a most potent aid to sound banking. Our national bank act needs amendment in its note-issuing feature, not in the direction of making redemption more sluggish than it now is, but the contrary. Elasticity of the note circulation, which was so marked under the Suffolk system and which prevails in Scotland and in Canada, requires frequent redemption of note issues. Expansion of the currency, when need arises, implies contraction when it has passed away. The one process is the complement of the other.

Bank Notes as Reserves.

Frequent Redemption Desirable.

Advocates of the policy of allowing national banks to count each other's notes as cash reserves point to the fact

that state banks are authorized by law to use them as such in New York and in some other states. The answer is that a bad practice ought not to be extended. The state laws ought to be changed in this particular so that nothing but money of full legal tender should be used as bank reserves, and preferably gold. It is true that Bank of England notes are counted as reserves in Great Britain, but they are legal tender and are now issued by the bank only in exchange for gold.

Most of the plans proposed for an elastic note system provide for a special tax on what is called "emergency circulation." This is a misleading phrase. It implies that there is a fixed standard of quantity in bank-note circulation, regardless of the state of trade, and that any demand for notes above that sum is an emergency.[1] If that were true it would constitute no reason for imposing an extra tax on the currency issued to meet it, since the tax would tend to defeat the very purpose for which it was issued. It is said that the tax is

"Emergency Circulation."

[1] Mr. James B. Forgan, in his testimony before the House Committee on Banking and Currency, gave an additional reason for discarding the phrase "emergency currency," in answer to a question put to him by Mr. Prince of Illinois, thus:

"Mr. Prince. Do you think there is now need of emergency currency legislation?

"Mr. Forgan. I do not; and I do not think that a condition can ever exist in this country or any other country that will warrant the use of the issue of anything that could bear such a terrifying name as 'emergency currency,' because as soon as you use it, and you say that a single bank has issued emergency currency, you have got the whole of your depositors on your back. Now, suppose that emergency does exist; if they believe an emergency exists, they will do as they have always done, — run on the banks. A proper currency prevents any such thing as an emergency ever getting into the minds of the public. They never know that an emergency exists."

"What's in a Name?"

intended to prevent inflation, by driving the notes home when they are no longer needed. But there is no way to determine when inflation exists except by the return of the notes to the issuing banks. An emergency exists when there is a demand on the banks for additional notes. Inflation exists when the reverse process sets in. There is no other criterion. A tax to prevent inflation is a superfluity.

The Proposed Tax.

The German bank law imposes a tax at the rate of 5 per cent on circulating notes of the Reichsbank in excess of the cash reserve, but the tax is not imposed for the purpose of sending the notes home. This is made clear by the fact that the notes are generally loaned at a less rate of interest than the tax itself—frequently at rates ranging from 3 to 4½ per cent. In the period from January 1, 1901, to July 7, 1906, there were thirty-seven occasions of overissue. In only twelve of these cases was the interest rate as high as the tax, while there were twenty-five when it was lower than the tax. Such emergencies in Germany come and go before the public are aware of them.

The German Practice.

CHAPTER XXI

THE CENTRAL BANK QUESTION

LOOKING at the past we find that we have had an average of one general bank suspension for each decade since 1837, while Europe has had none during the past fifty years, except those due to non-financial causes, such as wars or the action of governments. The saving quality of the European methods consists in the fortification of credit by a central bank.

Fortification of Credit.

Business conditions in the United States in 1907 were similar to those prevailing in other civilized countries, but our resources were greater in the aggregate than those of any other. This is proved by the fact that we were able to draw $107,000,000 of gold from the world's supply in the short space of two months by bills of exchange drawn against our current exports. Yet we alone suspended.

The central bank of the Old World type is a bank of banks. Its primary function is to rediscount bills of exchange which have their origin in various parts of the country and which pass through inferior banks whose indorsement they bear. These bills of exchange must be backed by two or more names of undoubted solvency, must run not more than ninety days, and must represent actual business transactions. All bills of this kind will be discounted by the central bank, which will give in exchange cash, or its own notes redeemable in gold on demand. The bank does not incur a deposit liability in the act of discounting bills.

Functions of a Central Bank.

The bank also makes advances, in the discretion of the managers, on goods unsold and on securities, but not as a

matter of course, and not to an unlimited amount. Such advances are placed in a different category from that of bills of exchange.

The power of note issue is granted to the central bank in Germany on condition that it shall hold a cash reserve of not less than 33 per cent against the same. All the revenues of the government are deposited in the bank, and its disbursements are made by checks drawn on the bank. The shareholders of the bank are private individuals. In Germany the bank is managed by the government; in France by the government and the shareholders together, the government being supreme; in England by the shareholders alone.

Its Note Issues.

The issue of the bank's notes, as above described, takes place in obedience to the demands of business and simultaneously therewith. The notes return to the bank in payment of maturing bills, or as deposits at the head bank or its branches. Thus the credit of the country is organized to carry on the business of the country with the minimum of cash. The currency is perfectly elastic. No inferior bank and no individual has any motive to draw on the reserves of the central bank for purposes of internal trade. No drain upon those reserves can take place except when gold is wanted for export. In such cases, if the drain becomes heavy, the bank raises the rate of discount till it ceases.

Drains on Bank Reserves.

Drains on the bank reserves in the United States usually run in the contrary direction. They are internal, not external. In the recent panic the depletion of bank reserves was most violent while we were importing gold from abroad. The country banks were draining the city banks. Mr. J. B. Forgan[1] said that during the week before the 28th of

[1] Testimony before the House Committee on Banking and Currency, April 15, 1908.

October the First National Bank of Chicago alone shipped $7,000,000 out of a legal reserve fund of $15,000,000 "for the purpose of taking care of country banks who feared that there was going to be a panic and made a drive at the nearest reserve city they had." This was before private depositors had made any run on the banks at all. Twelve thousand small banks were drawing simultaneously from the large banks of the reserve cities, reducing the big piles of cash that the public were accustomed to see reported in the newspapers, and accumulating twelve thousand small piles that the public never saw or heard of. No wonder if the private depositors took the alarm also.

How Banks drain Each Other in the United States.

A central bank of issue exists primarily in order to keep the internal industry and barter of the country going on with the least possible friction, by supplying just the amount of currency needed at all times and keeping it at par with gold. It is no part of its aim to supply capital to stock-brokers or speculators, but it may properly use for that purpose any surplus which it has on hand, in order to avoid a loss of interest for the time being. Neither a central bank of issue nor any number of banks can put out or keep out more notes than the country needs for hand-to-hand circulation. Any surplus will come back promptly and inevitably for redemption. Therefore no bank and no number of banks can, during a period of general inflation, supply the demands of speculators by fresh issues of bank notes, whether the notes are secured or unsecured. Nothing but bank reserves of actual cash will answer that purpose.

The Purpose of a Central Bank of Issue.

It may be asked how we shall be secured against favoritism in the matter of discounts. Will not the central bank extend its favors to some customers and withhold them from others? The central bank, of the Old World type, discounts all the paper offered to it that measures up to its standard

of goodness. Why should it refuse any? If its legal limit of note issue has been reached, it is only necessary to buy thirty-three dollars of gold for each one hundred dollars of new bills discounted. Then it receives interest on the whole one hundred and pays interest only on the thirty-three. There is no motive for favoritism and discrimination between persons and localities offering the same kind of bills. The only discrimination possible is between good paper and bad, between that which arises from mercantile transactions and that which results from kiteflying. The danger is not that the central bank would discriminate by extending its favors to some banks and not to others, but that there would not be a sufficient amount of bills of the type demanded to employ the resources of a central bank of $50,000,000 capital.

No Motive for Favoritism.

Apparent obstacles to the adoption of the central bank system in this country are twofold: first, the wide extent of the territory to be served; second, the habits of our people, who are accustomed to a system based upon individualism. Are these difficulties insuperable? The Second Bank of the United States and President Jackson's war against it will doubtless occur to readers as a warning against fresh experiments of that kind. But President Jackson had no objection to a bank controlled by the government. In fact he recommended one to Congress at the time when he was fighting against "Biddle's bank." Our habit of falling prostrate once in every ten years, and exposing ourselves to the jeers of mankind, is the worst banking habit we have, and the one which we could most advantageously lay aside.

Is a Central Bank Feasible?

Most of the plans for banking reform now or lately under discussion contemplate the coöperation of banks in a certain number of geographical units. The aim is to bind them together like the bundle of sticks with which the old man in the fable instructed his sons. The idea is an outgrowth of

the clearing-house association. It seeks to utilize the same for other purposes than that of clearing. It is the nucleus of the bill passed by Congress, May 30, 1908. Thus the country has turned its face toward centralization, and the question is whether public opinion is prepared to go farther in the same direction.

Advantages of Union.

The chairman of the National Monetary Commission, appointed in pursuance of the act of Congress aforesaid (Honorable Nelson W. Aldrich), has made suggestions for overcoming the difficulties mentioned above. He is of the opinion that the present national banking law has become obsolete and that it ought to be modernized. To this end he has submitted to the Commission the outline of a plan for betterment.[1]

The Aldrich Plan.

The essential feature of it is the establishment of a banking institution, which is to be the fiscal agent of the government, with a capital not exceeding $300,000,000. It is to be called "The Reserve Association of America." Its stock may be subscribed for and owned solely by the national banks of the United States, in exact proportion to their capital, and is not to be transferable. The principal office of the association is to be at Washington City. The earnings are to be paid to the stockholders at first, to the extent of 4 per cent, and subsequently to the extent of 5 per cent, on the paid-in capital, all other earnings to go to the government. No bank will be compelled to join the association.

For a Reserve Association.

All subscribing banks will be required to group themselves in local associations, each association to have not less than ten banks with an aggregate capital of not less than $5,000,000. All the local associations are to group themselves into fifteen divisions called districts. Each local association shall elect annually a board of directors, three-fifths of which are to be elected by each bank

Local Associations.

[1] See Appendix B.

having one representative and one vote, without reference to the size of the bank.

There shall be a branch of the Reserve Association in each of the fifteen districts, and this branch shall be governed by a board of directors chosen by the local associations composing the district. Additional directors equal to one-third the number of the local associations shall be appointed to represent the business interests of the locality, other than the banking interests.

Branches.

The Reserve Association shall be controlled by a board of forty-five directors. Six of these shall consist of the governor, two deputy governors, the Secretary of the Treasury, the Secretary of Commerce and Labor, and the Comptroller of the Currency. The remainder are to be chosen by the branches and the local associations. The governor and two deputy governors are to be selected by the President of the United States from a list submitted by the board of directors. Each branch shall have a manager and a deputy manager appointed by the governor with the approval of an executive committee of the central board of directors.

Directors.

The government of the United States and those national banks owning stock in the Reserve Association shall be the sole depositors in said association, and the business of said association shall be confined to the government and the subscribing banks. The Reserve Association may rediscount any commercial paper bearing the indorsement of any bank having a deposit with it, provided said paper was made thirty days prior to the date of rediscount and has not more than twenty-eight days still to run. It may also rediscount for any depositing bank any paper arising out of commercial transactions running not more than four months, but such paper must be guaranteed by the local association of which the bank asking rediscount is a member. Any member of a local association may apply to that association

Restrictions.

Rediscounts.

for a guaranty of the commercial paper which it desires to rediscount. The total amount of guaranties by a local association shall not exceed the aggregate capital and surplus of the banks forming the local association.

The Reserve Association may also in certain cases discount the direct obligation of a depositing bank when accompanied by satisfactory securities, the loan not to exceed two-thirds of the actual value of the pledged securities. The Reserve Association shall pay no interest on deposits. The rate of discount of the Reserve Association shall be uniform throughout the United States. The Reserve Association may buy from, or sell to, its depositors foreign bills of exchange arising from commercial transactions, running not more than ninety days and bearing the signatures of at least three responsible parties. It may have agencies in foreign countries. All government funds are to be deposited with the Reserve Association, and government disbursements shall be made by drafts or checks drawn on it.

Other Discounts.

National banks may maintain their existing issues of circulating notes, but there shall be no further issues beyond those now outstanding. No notes voluntarily retired shall be reissued. The Reserve Association must, for a period of one year, offer to purchase at not less than par the 2 per cent bonds now held by national banks as security for their circulation, with the currency privilege attached to said bonds, and assume all responsibility for said notes, it being the policy of the United States to retire such bond-secured circulation and to substitute therefor notes of the Reserve Association subject to certain rates of taxation. All note issues of the Reserve Association must be covered to the extent of one-third by gold or other lawful money, and the remaining two-thirds by United States bonds or bankable commercial paper of the specified kind. The circulating notes are to constitute a first lien upon all the assets of the Reserve Association.

Note Issues.

The institution here outlined is fitted to perform the essential functions of a central bank, although it bears a different title. Probably Reserve Association is the better name, since it indicates the principal object aimed at, and since it avoids certain popular prejudices which attach to the other name. Its first endeavor is to strengthen the whole body of banking by economizing the cash reserves of the country and making them available for the protection of banks and business men at all times, and especially in squally times. Once put in operation, there will be no motive for banks to make runs on each other, or for depositors to make runs on the banks. The plan contemplates the refunding of the present 2 per cent bonds into 3 per cents, in a way which will allow the Reserve Association to dispose of its bonds and so eventually get rid of the bond basis of our circulation. It aims also to supply a discount market, which shall be an unfailing resource for all commercial paper which measures up to the established standard, and a flexible currency to be based eventually upon general banking assets, and the substitution for the present independent Treasury system of an automatic method of returning the government's surplus revenue to the money market from day to day.

Advantages of the Plan.

The new system will not prevent trade reactions. It will not prevent the bursting of bubbles of speculation when overblown, but it will probably have a steadying influence by standardizing the commercial paper admitted to discount, by inducing mutual supervision of the banks in the local associations, and by creating a higher sense of responsibility on the part of bankers generally. It will thus curtail the fires of speculation and tend to keep them within limits, instead of allowing them to spread through the community at every considerable crisis. Since the ultimate banking reserve will be in the control of an institution too strong to fail, and since there can be no limit to the amount of currency issued

Steadying Influence.

except the power to redeem it on demand, and no delay in issuing it, there can be no paroxysm of credit, in which solvent and insolvent debtors may be involved in a common ruin.

The Aldrich plan is workable. Objections are made to it that such a colossal institution may become a tool of politicians, or that it may fall under the domination of a few individuals in Wall Street. The answer is that it will be controlled by the participating banks of the whole country, and that they could not part with their shares, even if they should desire to do so. The objection on the score of politics lies equally against our form of government, and against all forms of government. If we can safely intrust our other national interests to a President elected every four years, we can surely trust him to select a governor and two deputy governors of the Reserve Association from a list of names submitted to him by the directors thereof. This power of appointment has been exercised by the chief of the state in France more than one hundred years under all governments, — monarchial, republican, and revolutionary, — without harmful consequences. Objections based upon the Bank war in President Jackson's time are groundless by reason of the dissimilarity of the institutions concerned, and of the attendant circumstances. A war between the President of the United States and a fiscal agency, or exchange office, owned by thousands of banks in all parts of the country, is unimaginable. By way of keeping the Reserve Association free from political entanglement it is provided that no member of any national or State legislative body shall be a director of it, or of any of the branches, or of any local association.

Objections considered.

RECAPITULATION

A central bank is the keeper of the ultimate gold reserve of the nation, which it regulates by raising or lowering the rate of discount. Its chief function is the rediscounting of

commercial paper for other banks. It organizes credit by requiring that all paper offered for discount shall be sound, and that all such paper offered shall be discounted at a uniform rate of interest. It has the power of note issue limited only by its cash reserve. The power of note issue is not necessarily exclusive, but it has been found in practice that other banks in the same country, which have that power, gradually abandon it without compulsion. The organization of credit by means of a central bank of sufficient capital prevents panics by assuring the commercial community that all persons worthy of credit can at all times obtain it. A central bank may or may not be controlled by the government. Its usual form of control is in part by the government and in part by private shareholders.

APPENDIX A

THE ALDRICH-VREELAND BILL, OR THE ACT OF MAY 30, 1908

On May 28, 1908, the House of Representatives, after a debate of one hour, passed a bill, in which the Senate concurred, to amend the national banking laws. It had not been considered by any regular committee of either branch of Congress, but was hastily put together by a republican caucus committee as a political rather than a financial expedient, so that the Republicans might be able to say in the coming campaign that they had made provision for an "emergency currency" in case of a renewal of the stringency of the preceding autumn. The bill consisted of a part of a measure prepared somewhat earlier by Congressman Vreeland of New York, and of a part of the Aldrich bill which had previously passed the Senate. It embraces the principles of an "asset currency," which neither house of Congress had ever previously accepted. It must therefore be considered a step in the right direction. The bill was signed by the President and is now a law. The text of the measure follows:

Be it enacted by the Senate and House of Representatives of the United States of America, in Congress assembled, that national banking associations, each having an unimpaired capital and a surplus of not less than twenty per centum, not less than ten in number, having an aggregate capital and surplus of at least five millions of dollars, may form voluntary associations to be designated as national currency associations. The banks uniting to

form such association shall, by their presidents or vice-presidents, acting under authority from the board of directors, make and file with the Secretary of the Treasury a certificate setting forth the names of the banks composing the association, the principal place of business of the association, and the name of the association, which name shall be subject to the approval of the Secretary of the Treasury. Upon the filing of such certificate the associated banks therein named shall become a body corporate, and by the name so designated and approved may sue and be sued and exercise the powers of a body corporate for the purposes hereinafter mentioned: *Provided*, that not more than one such national currency association shall be formed in any city: *Provided, further*, that the several members of such national currency association shall be taken, as nearly as conveniently may be, from a territory composed of a State or part of a State, or contiguous parts of one or more States: and *Provided, further*, that any national bank in such city or territory, having the qualifications herein prescribed for membership in such national currency association, shall, upon its application to and upon the approval of the Secretary of the Treasury, be admitted to membership in a national currency association for that city or territory, and upon such admission shall be deemed and held a part of the body corporate, and as such entitled to all the rights and privileges and subject to all the liabilities of an original member: and *Provided, further*, that each national currency association shall be composed exclusively of banks not members of any other national currency association.

The dissolution, voluntary or otherwise, of any bank in such association shall not affect the corporate existence of the association unless there shall then remain less than the minimum number of ten banks: *Provided, however*, that the reduction of the number of said banks below the minimum of ten shall not affect the existence of the corporation with respect to the assertion of all rights in favor of or against such association. The affairs of the association shall be managed by a board consisting of one representative from each bank. By-laws for the government of the association shall be made by the board, subject to

the approval of the Secretary of the Treasury. A president, vice-president, secretary, treasurer, and an executive committee of not less than five members, shall be elected by the board. The powers of such board, except in the election of officers and making of by-laws, may be exercised through its executive committee.

The national currency association herein provided for shall have and exercise any and all powers necessary to carry out the purposes of this section, namely, to render available, under the direction and control of the Secretary of the Treasury, as a basis for additional circulation any securities, including commercial paper, held by a national banking association. For the purpose of obtaining such additional circulation, any bank belonging to any national currency association, having circulating notes outstanding secured by the deposit of bonds of the United States to an amount not less than forty per centum of its capital stock, and which has its capital unimpaired and a surplus of not less than twenty per centum, may deposit with and transfer to the association, in trust for the United States, for the purpose hereinafter provided, such of the securities above mentioned as may be satisfactory to the board of the association. The officers of the association may thereupon, in behalf of such bank, make application to the Comptroller of the Currency for an issue of additional circulating notes to an amount not exceeding seventy-five per centum of the cash value of the securities or commercial paper so deposited. The Comptroller of the Currency shall immediately transmit such application to the Secretary of the Treasury with such recommendation as he thinks proper, and if, in the judgment of the Secretary of the Treasury, business conditions in the locality demand additional circulation, and if he be satisfied with the character and value of the securities proposed and that a lien in favor of the United States on the securities so deposited and on the assets of the banks composing the association will be amply sufficient for the protection of the United States, he may direct an issue of additional circulating notes to the association, on behalf of such bank, to an amount in his discretion, not, however, exceeding seventy-five per centum of the cash value of the securities so deposited: *Provided*, that upon the

deposit of any of the State, city, town, county, or other municipal bonds, of a character described in section three of this Act, circulating notes may be issued to the extent of not exceeding ninety per centum of the market value of such bonds so deposited: and *Provided, further*, that no national banking association shall be authorized in any event to issue circulating notes based on commercial paper in excess of thirty per centum of its unimpaired capital and surplus. The term "commercial paper" shall be held to include only notes representing actual commercial transactions, which when accepted by the association shall bear the names of at least two responsible parties and have not exceeding four months to run.

The banks and the assets of all banks belonging to the association shall be jointly and severally liable to the United States for the redemption of such additional circulation; and to secure such liability the lien created by section fifty-two hundred and thirty of the Revised Statutes shall extend to and cover the assets of all banks belonging to the association, and to the securities deposited by the banks with the association pursuant to the provisions of this Act; but as between the several banks composing such association each bank shall be liable only in the proportion that its capital and surplus bears to the aggregate capital and surplus of all such banks. The association may, at any time, require of any of its constituent banks a deposit of additional securities or commercial paper, or an exchange of the securities already on deposit, to secure such additional circulation; and in case of the failure of such bank to make such deposit or exchange the association may, after ten days' notice to the bank, sell the securities and paper already in its hands at public sale, and deposit the proceeds with the Treasurer of the United States as a fund for the redemption of such additional circulation. If such fund be insufficient for that purpose the association may recover from the bank the amount of the deficiency by suit in the circuit court of the United States, and shall have the benefit of the lien hereinbefore provided for in favor of the United States upon the assets of such bank. The association or the Secretary of the Treasury may permit or require the withdrawal of any such

securities or commercial paper and the substitution of other securities or commercial paper of equal value therefor.

SEC. 2. That whenever any bank belonging to a national currency association shall fail to preserve or make good its redemption fund in the Treasury of the United States, required by section three of the Act of June twentieth, eighteen hundred and seventy-four, chapter three hundred and forty-three, and the provisions of this Act, the Treasurer of the United States shall notify such national currency association to make good such redemption fund, and upon the failure of such national currency association to make good such fund, the Treasurer of the United States may, in his discretion, apply so much of the redemption fund belonging to the other banks composing such national currency association as may be necessary for that purpose; and such national currency association may, after five days' notice to such bank, proceed to sell at public sale the securities deposited by such bank with the association pursuant to the provisions of section one of this Act, and deposit the proceeds with the Treasurer of the United States as a fund for the redemption of the additional circulation taken out by such bank under this Act.

SEC. 3. That any national banking association which has circulating notes outstanding, secured by the deposit of United States bonds to an amount of not less than forty per centum of its capital stock, and which has a surplus of not less than twenty per centum, may make application to the Comptroller of the Currency for authority to issue additional circulating notes to be secured by the deposit of bonds other than bonds of the United States. The Comptroller of the Currency shall transmit immediately the application, with his recommendation, to the Secretary of the Treasury, who shall, if in his judgment business conditions in the locality demand additional circulation, approve the same, and shall determine the time of issue and fix the amount, within the limitations herein imposed, of the additional circulating notes to be issued. Whenever after receiving notice of such approval any such association shall deposit with the Treasurer or any assistant treasurer of the United States such of the bonds described in this section as shall be approved in character and amount by the

Treasurer of the United States and the Secretary of the Treasury, it shall be entitled to receive, upon the order of the Comptroller of the Currency, circulating notes in blank, registered and countersigned as provided by law, not exceeding in amount ninety per centum of the market value, but not in excess of the par value of any bonds so deposited, such market value to be ascertained and determined under the direction of the Secretary of the Treasury.

The Treasurer of the United States, with the approval of the Secretary of the Treasury, shall accept as security for the additional circulating notes provided for in this section, bonds or other interest-bearing obligations of any State of the United States, or any legally authorized bonds issued by any city, town, county, or other legally constituted municipality or district in the United States which has been in existence for a period of ten years, and which for a period of ten years previous to such deposit has not defaulted in the payment of any part of either principal or interest of any funded debt authorized to be contracted by it, and whose net funded indebtedness does not exceed ten per centum of the valuation of its taxable property, to be ascertained by the last preceding valuation of property for the assessment of taxes. The Treasurer of the United States, with the approval of the Secretary of the Treasury, shall accept, for the purposes of this section, securities herein enumerated in such proportions as he may from time to time determine, and he may with such approval at any time require the deposit of additional securities, or require any association to change the character of the securities already on deposit.

SEC. 4. That the legal title of all bonds, whether coupon or registered, deposited to secure circulating notes issued in accordance with the terms of section three of this Act shall be transferred to the Treasurer of the United States in trust for the association depositing them, under regulations to be prescribed by the Secretary of the Treasury. A receipt shall be given to the association by the Treasurer or any assistant treasurer of the United States, stating that such bond is held in trust for the association on whose behalf the transfer is made, and as security for the redemption and payment of any circulating notes that have

been or may be delivered to such association. No assignment or transfer of any such bond by the Treasurer shall be deemed valid unless countersigned by the Comptroller of the Currency. The provisions of sections fifty-one hundred and sixty-three, fifty-one hundred and sixty-four, fifty-one hundred and sixty-five, fifty-one hundred and sixty-six, and fifty-one hundred and sixty-seven and sections fifty-two hundred and twenty-four to fifty-two hundred and thirty-four, inclusive, of the Revised Statutes respecting United States bonds deposited to secure circulating notes shall, except as herein modified, be applicable to all bonds deposited under the terms of section three of this Act.

SEC. 5. That the additional circulating notes issued under this Act shall be used, held, and treated in the same way as circulating notes of national banking associations heretofore issued and secured by a deposit of United States bonds, and shall be subject to all the provisions of law affecting such notes except as herein expressly modified: *Provided*, that the total amount of circulating notes outstanding of any national banking association, including notes secured by United States bonds as now provided by law, and notes secured otherwise than by deposit of such bonds, shall not at any time exceed the amount of its unimpaired capital and surplus: and *Provided, further*, that there shall not be outstanding at any time circulating notes issued under the provisions of this Act to an amount of more than five hundred millions of dollars.

SEC. 6. That whenever and so long as any national banking association has outstanding any of the additional circulating notes authorized to be issued by the provisions of this Act it shall keep on deposit in the Treasury of the United States, in addition to the redemption fund required by section three of the Act of June twentieth, eighteen hundred and seventy-four, an additional sum equal to five per centum of such additional circulation at any time outstanding, such additional five per centum to be treated, held, and used in all respects in the same manner as the original redemption fund provided for by said section three of the Act of June twentieth, eighteen hundred and seventy-four.

SEC. 7. In order that the distribution of notes to be issued under the provisions of this Act shall be made as equitable as practicable between the various sections of the country, the Secretary of the Treasury shall not approve applications from associations in any State in excess of the amount to which such State would be entitled of the additional notes herein authorized on the basis of the proportion which the unimpaired capital and surplus of the national banking associations in such State bears to the total amount of unimpaired capital and surplus of the national banking associations of the United States: *Provided, however*, that in case the applications from associations in any State shall not be equal to the amount which the associations of such State would be entitled to under this method of distribution, the Secretary of the Treasury may, in his discretion, to meet an emergency, assign the amount not thus applied for to any applying association or associations in States in the same section of the country.

SEC. 8. That it shall be the duty of the Secretary of the Treasury to obtain information with reference to the value and character of the securities authorized to be accepted under the provisions of this Act, and he shall from time to time furnish information to national banking associations as to such securities as would be acceptable under the provisions of this Act.

SEC. 9. That section fifty-two hundred and fourteen of the Revised Statutes, as amended, be further amended to read as follows:

"SEC. 5214. National banking associations having on deposit bonds of the United States, bearing interest at the rate of two per centum per annum, including the bonds issued for the construction of the Panama Canal, under the provisions of section eight of 'An Act to provide for the construction of a canal connecting the waters of the Atlantic and Pacific oceans,' approved June twenty-eight, nineteen hundred and two, to secure its circulating notes, shall pay to the Treasurer of the United States, in the months of January and July, a tax of one-fourth of one per centum each half year upon the average amount of such of its notes in circulation as are based upon the deposit of such bonds;

and such associations having on deposit bonds of the United States bearing interest at a rate higher than two per centum per annum shall pay a tax of one-half of one per centum each half year upon the average amount of such of its notes in circulation as are based upon the deposit of such bonds. National banking associations having circulating notes secured otherwise than by bonds of the United States shall pay for the first month a tax at the rate of five per centum per annum upon the average amount of such of their notes in circulation as are based upon the deposit of such securities, and afterwards an additional tax of one per centum per annum for each month until a tax of ten per centum per annum is reached, and thereafter such tax of ten per centum per annum, upon the average amount of such notes. Every national banking association having outstanding circulating notes secured by a deposit of other securities than United States bonds shall make monthly returns, under oath of its president or cashier, to the Treasurer of the United States, in such form as the Treasurer may prescribe, of the average monthly amount of its notes so secured in circulation; and it shall be the duty of the Comptroller of the Currency to cause such reports of notes in circulation to be verified by examination of the banks' records. The taxes received on circulating notes secured otherwise than by bonds of the United States shall be paid into the Division of Redemption of the Treasury and credited and added to the reserve fund held for the redemption of United States and other notes."

SEC. 10. That section nine of the Act approved July twelfth, eighteen hundred and eighty-two, as amended by the Act approved March fourth, nineteen hundred and seven, be further amended to read as follows:

"SEC. 9. That any national banking association desiring to withdraw its circulating notes, secured by deposit of United States bonds in the manner provided in section four of the Act approved June twentieth, eighteen hundred and seventy-four, is hereby authorized for that purpose to deposit lawful money with the Treasurer of the United States and, with the consent of the Comptroller of the Currency and the approval of the Secretary of the Treasury, to withdraw a proportionate amount of bonds held

as security for its circulating notes in the order of such deposits: *Provided*, that not more than nine millions of dollars of lawful money shall be so deposited during any calendar month for this purpose.

"Any national banking association desiring to withdraw any of its circulating notes, secured by the deposit of securities other than bonds of the United States, may make such withdrawal at any time in like manner and effect by the deposit of lawful money or national bank notes with the Treasurer of the United States, and upon such deposit a proportionate share of the securities so deposited may be withdrawn: *Provided*, that the deposits under this section to retire notes secured by the deposit of securities other than bonds of the United States shall not be covered into the Treasury, as required by section six of an Act entitled 'An Act directing the purchase of silver bullion and the issue of Treasury notes thereon, and for other purposes,' approved July fourteen, eighteen hundred and ninety, but shall be retained in the Treasury for the purpose of redeeming the notes of the bank making such deposit."

SEC. 11. That section fifty-one hundred and seventy-two of the Revised Statutes be, and the same is hereby, amended to read as follows:

"SEC. 5172. In order to furnish suitable notes for circulation, the Comptroller of the Currency shall, under the direction of the Secretary of the Treasury, cause plates and dies to be engraved, in the best manner to guard against counterfeiting and fraudulent alterations, and shall have printed therefrom, and numbered, such quantity of circulating notes, in blank, of the denominations of five dollars, ten dollars, twenty dollars, fifty dollars, one hundred dollars, five hundred dollars, one thousand dollars, and ten thousand dollars, as may be required to supply the associations entitled to receive the same. Such notes shall state upon their face that they are secured by United States bonds or other securities, certified by the written or engraved signatures of the Treasurer and Register and by the imprint of the seal of the Treasury. They shall also express upon their face the promise of the association receiving the same to pay on demand, attested by the signature of

the president or vice-president and cashier. The Comptroller of the Currency, acting under the direction of the Secretary of the Treasury, shall as soon as practicable cause to be prepared circulating notes in blank, registered and countersigned, as provided by law, to an amount equal to fifty per centum of the capital stock of each national banking association; such notes to be deposited in the Treasury or in the sub-treasury of the United States nearest the place of business of each association, and to be held for such association, subject to the order of the Comptroller of the Currency, for their delivery as provided by law: *Provided*, that the Comptroller of the Currency may issue national bank notes of the present form until plates can be prepared and circulating notes issued as above provided: *Provided, however*, that in no event shall bank notes of the present form be issued to any bank as additional circulation provided for by this Act."

SEC. 12. That circulating notes of national banking associations, when presented to the Treasury for redemption, as provided in section three of the Act approved June twentieth, eighteen hundred and seventy-four, shall be redeemed in lawful money of the United States.

SEC. 13. That all acts and orders of the Comptroller of the Currency and the Treasurer of the United States authorized by this Act shall have the approval of the Secretary of the Treasury who shall have power, also, to make any such rules and regulations and exercise such control over the organization and management of national currency associations as may be necessary to carry out the purposes of this Act.

SEC. 14. That the provisions of section fifty-one hundred and ninety-one of the Revised Statutes, with reference to the reserves of national banking associations, shall not apply to deposits of public moneys by the United States in designated depositaries.

SEC. 15. That all national banking associations designated as regular depositaries of public money shall pay upon all special and additional deposits made by the Secretary of the Treasury in such depositaries, and all such associations designated as temporary depositaries of public money shall pay upon all sums of public money deposited in such associations interest at such rate as the

Secretary of the Treasury may prescribe, not less, however, than one per centum per annum upon the average monthly amount of such deposits: *Provided, however*, that nothing contained in this Act shall be construed to change or modify the obligation of any association or any of its officers for the safe-keeping of public money: *Provided, further*, that the rate of interest charged upon such deposits shall be equal and uniform throughout the United States.

SEC. 16. That a sum sufficient to carry out the purposes of the preceding sections of this Act is hereby appropriated out of any money in the Treasury not otherwise appropriated.

SEC. 17. That a Commission is hereby created, to be called the "National Monetary Commission," to be composed of nine members of the Senate, to be appointed by the Presiding Officer thereof, and nine members of the House of Representatives, to be appointed by the Speaker thereof; and any vacancy on the Commission shall be filled in the same manner as the original appointment.

SEC. 18. That it shall be the duty of this Commission to inquire into and report to Congress at the earliest date practicable, what changes are necessary or desirable in the monetary system of the United States or in the laws relating to banking and currency, and for this purpose they are authorized to sit during the sessions or recess of Congress, at such times and places as they may deem desirable, to send for persons and papers, to administer oaths, to summons and compel the attendance of witnesses, and to employ a disbursing officer and such secretaries, experts, stenographers, messengers, and other assistants as shall be necessary to carry out the purposes for which said Commission was created. The Commission shall have the power, through subcommittee or otherwise, to examine witnesses and to make such investigations and examinations, in this or other countries, of the subjects committed to their charge as they shall deem necessary.

SEC. 19. That a sum sufficient to carry out the purposes of sections seventeen and eighteen of this Act, and to pay the necessary expenses of the Commission and its members, is hereby appropriated, out of any money in the Treasury not otherwise

appropriated. Said appropriation shall be immediately available and shall be paid out on the audit and order of the chairman or acting chairman of said Commission, which audit and order shall be conclusive and binding upon all Departments as to the correctness of the accounts of such Commission.

SEC. 20. That this Act shall expire by limitation on the thirtieth day of June, nineteen hundred and fourteen.

Approved May 30, 1908.

The Commission appointed in pursuance of the foregoing act consists of:

SENATORS	REPRESENTATIVES
Nelson W. Aldrich, R.I.	E. B. Vreeland, N.Y.
Eugene Hale, Maine	J. W. Weeks, Mass.
P. C. Knox, Pa.	Theo. E. Burton, Ohio
J. C. Burrows, Mich.	G. F. Burgess, Tex.
J. W. Bailey, Tex.	A. P. Pujo, La.
H. D. Money, Miss.	L. P. Padgett, Tenn.
H. M. Teller, Colo.	R. W. Bonynge, Colo.
F. P. Flint, Cal.	J. McLachlan, Cal.
J. P. Taliaferro, Fla.	Geo. W. Prince, Ill.

Thus the act of May 30, 1908, authorizes, in two different ways, the issue of national bank notes additional to those heretofore existing, namely:

1. By the pledging of any securities including commercial paper, representing actual commercial transactions and bearing two or more responsible signatures, and running not more than four months. Such securities and paper shall remain in the custody of the national currency association to which the bank applying for the circulating notes belongs. The amount of notes issuable thereon shall not exceed 75 per cent of the cash value thereof. All the banks in the currency association are jointly and severally liable for all the circulating notes so issued.

2. By the transfer to the custody of the Treasurer of the United States of any bonds, or other interest bearing obligations, of any state of the United States, or of any legally authorized bonds of any city, town, county, municipality, or district in the United States. Against such securities circulating notes may be issued not exceeding 90 per cent of their market value.

All of the securities in both categories are subject to the approval of the Secretary of the Treasury, who may require additional securities, or a substitution of other securities, in any case where he deems the existing ones insufficient. The national currency associations may exercise the same powers and make the same requirement in respect of the securities deposited with them by any bank in their respective associations.

Bank notes in either of these categories shall be subject to a tax of 5 per cent per annum for the first month and afterwards to an additional tax of 1 per cent for each month until a tax of 10 per cent per annum is reached, which rate shall continue as long as they remain outstanding. For all such notes the issuing bank must keep a redemption fund in the Treasury of the United States of 10 per cent, *i.e.*, 5 per cent more than the amount required for the redemption of notes issued against government bonds. The Treasury assumes the responsibility of redeeming the notes of all failed banks. No notes have been issued under this act.

APPENDIX B

THE ALDRICH PLAN FOR THE RESERVE ASSOCIATION OF AMERICA

Charter and Location

It is proposed to charter the Reserve Association of America, which will be the principal fiscal agent of the government of the United States. The authorized capital of the Reserve Association shall be approximately $300,000,000. The length of its charter shall be fifty years. The head office of the association shall be in Washington, D.C.

The country shall be divided into fifteen districts, and a branch of the Reserve Association shall be located in each district.

The Reserve Association and its branches shall be exempt from state and local taxation, except in respect to taxes upon real estate owned by it.

Capital

Only national banks of the classes hereinafter provided for may subscribe to the capital stock of the Reserve Association. A national bank having a minimum capital of at least $25,000 may subscribe to an amount of capital stock of the Reserve Association equal to 20 per cent of the stock of the subscribing national bank, and not less, and each of such subscribing banks shall become a member of a local association as hereinafter provided for. Fifty per cent of the subscriptions to the capital stock of the Reserve Association shall be called in cash; the balance of the subscriptions will remain a liability of the stockholders, subject to call.

Shares of the capital stock of the Reserve Association will not be transferable, and under no circumstances may they be owned by any corporation other than the subscribing national bank, nor by any individual, nor may they be owned by any national bank in any other amount than in the proportion here provided. In the case of a national bank increasing its capital after it once becomes a subscriber to the stock of the Reserve Association, the national bank shall thereupon subscribe for an additional amount of the capital stock of the Reserve Association equal to 20 per cent of the national bank's increase of capital, paying therefor its then book value, but only one-half of this additional subscription will be called in cash, as hereinbefore provided. In the event of a national bank which is a holder of the capital stock of the Reserve Association decreasing its capital, it shall surrender a proportionate amount of its holdings of the capital stock of the Reserve Association; or if a national bank goes into liquidation, it shall surrender all of its holdings of the capital stock of the Reserve Association. The capital of the Reserve Association so surrendered shall be canceled, and the national bank thus surrendering stock in the Reserve Association shall receive in payment therefor a sum equal to the then book value, as shown on the balance sheet of the Reserve Association, of the stock so surrendered.

Earnings and Dividends

The earnings of the Reserve Association shall be distributed in the following manner:

After the payment of all expenses and taxes the stockholders shall receive 4 per cent. Further earnings shall be divided, one-half to go to the surplus of the Reserve Association until that surplus shall amount to 20 per cent of the paid-in capital; one-fourth to go to the government of the United States, and one-fourth to the stockholders; but when the stockholders' dividends shall reach 5 per cent, they shall receive no additional

distribution. After the stockholders receive 5 per cent the earnings shall be divided, one-half to be added to the surplus of the Reserve Association and one-half to go to the government. After the stockholders receive 5 per cent per annum and the surplus of the Reserve Association amounts to 20 per cent of the paid-in capital, all excess earnings shall go to the government. The minimum dividends to the stockholders shall be cumulative.

Local Associations of National Banks

All subscribing banks shall be formed into associations of national banks, to be designated as local associations. Every local association shall be composed of not less than ten banks, and the combined capital and surplus of the members of each local association shall aggregate not less than $5,000,000.

All the local associations shall be grouped into fifteen divisions, to be called districts. The territory included in the local associations shall be so apportioned that every national bank will be located within the boundaries of some local association. Every subscribing national bank shall become a member of the local association of the territory in which it is situated.

Directors of Local Associations

Each local association shall elect annually a board of directors in the following manner:

The number of the directors may be determined by the by-laws of the local associations. Three-fifths of that number shall be elected by ballot cast by the representatives of the banks that are members of the local association, each bank having one representative, and each representative one vote, without reference to the size of the bank. Two-fifths of the whole number of directors of the local association shall be elected by these same representatives of the several banks that are members of the association; but in voting for these additional directors

each representative shall be entitled to as many votes as the bank which he represents holds shares in the Reserve Association. At such elections there shall be no proxies. The authorized representatives of a bank, as herein provided, must be either the president, vice president, or cashier of the bank he represents.

Directors of Branches

As heretofore provided, all the local associations shall be grouped into fifteen divisions, and each of these divisions shall be designated a district. There shall be located in each district a branch of the Reserve Association. Each of the fifteen branches of the Reserve Association shall have a board of directors, and those directors shall be elected in the following manner:

The board of directors of each local association shall elect by ballot one member of the board of directors of the branch of the Reserve Association. In this manner there will thus be elected as many directors of the branch of the Reserve Association as there may be local associations in the district in which that branch of the Reserve Association is located. In addition to that number there shall be elected a number of the directors equal to two-thirds of the number of local associations in the district where the branch is located. Such additional directors shall be elected in the following manner:

There shall be chosen by the banks composing each local association a voting representative or proxy holder. In choosing such voting representative each bank shall be entitled to as many votes as it holds shares in the Reserve Association. The voting representatives of the several local associations which form a district shall then meet at the office of the branch and elect an additional number of directors of the branch equal to two-thirds of the number elected directly by the local associations; that is, equal to two-thirds of the number of local associations composing the district. Each voting representative at

such election shall have a number of votes equal to the number of shares in the Reserve Association held by all the banks composing the local association which he represents.

The first business of the board of the branch as thus constituted shall be to add to its numbers by the election of an additional number of directors equal to one-third the number of local associations situated in the district. Such additional directors shall fairly represent the industrial, commercial, agricultural, and other interests of the district and shall not be officers of banks. Directors of banks shall not be considered as officers.

The manager of the branch shall be ex officio a member of the board of directors of the branch and shall be chairman of the board.

The board of directors of a branch of the Reserve Association will thus be composed of:

First. A group of directors equal in number to the number of local associations composing the district, and this group shall be elected by the directors of the local association, each director having one vote.

Second. A group of directors equal to two-thirds of the foregoing group and elected by stock representation.

Third. A group of directors equal in number to one-third of the first group, representing the industrial, commercial, agricultural, and other interests of the district, and elected by the votes of the first two groups, each director thus voting having one vote.

Fourth. The manager of the branch shall be ex officio a member of the board of directors of the branch and shall be chairman of the board.

All the members of the board of directors of the branch, except the ex officio member, shall, at the first meeting of the board, be classified into three classes, and the terms of office of these three classes shall be respectively one, two, and three years. Thereafter members of the board shall be elected for a term of three years.

Directors of the Reserve Association

The board of the Reserve Association shall consist of forty-five directors, and it shall be composed in the following manner:

First. Six ex officio members, namely, the governor of the Reserve Association (who shall be chairman of the board), two deputy governors of the Reserve Association, the Secretary of the Treasury, the Secretary of Commerce and Labor, and the Comptroller of the Currency.

Second. Fifteen directors to be elected, one by the board of directors of each branch of the Reserve Association. They shall be elected by ballot, each member of the branch board having one vote.

Third. Twelve directors, who shall be elected by voting representatives, one representing the banks embraced in each district. Each voting representative shall cast a number of votes equal to the number of shares in the Reserve Association held by all the banks in the district which he represents.

Fourth. The board as thus constituted shall select twelve additional members, who shall fairly represent the industrial, commercial, agricultural, and other interests of the country, and who shall not be officers of banks. Directors of banks shall not be considered as officers.

At the first meeting of the board all the members of the board, except the ex officio members, shall be classified into three classes, and the terms of office of these three classes shall be respectively one, two, and three years. Thereafter members of the board shall be elected for a term of three years.

No member of any national or state legislative body shall be a director of the Reserve Association, nor of any of the branches, nor of any local association.

The directors of the Reserve Association shall annually elect an executive committee and such other committees as the

by-laws of the Reserve Association may provide. The executive committee shall consist of nine members, of which the governor of the Reserve Association shall be ex officio chairman, and the two deputies and the Comptroller of the Currency ex officio members.

The executive committee shall have all the authority which is vested in the board of directors, except such as may be specifically delegated by the board to other committees or to the executive officers.

There shall be a board of supervision elected by the board of directors from among its number, of which the Secretary of the Treasury shall be ex officio chairman.

Executive Officers of the Reserve Association

The executive officers of the Reserve Association shall consist of a governor, two deputy governors, a secretary, and such subordinate officers as may be provided by the by-laws. The governor and deputy governors shall be selected by the President of the United States from a list submitted by the board of directors. The governor shall be subject to removal by the President of the United States for cause. The term of office of the deputies shall be seven years, but the two deputies first appointed shall be for terms of four years and seven years respectively.

In the absence of the governor or his inability to act, the deputy who is senior in point of service shall act as governor.

Executive Officers of Branches

Each branch shall have a manager and a deputy manager. They shall be appointed by the governor of the Reserve Association, with the approval of the executive committee.

The powers and duties of the manager and deputy manager and of the various committees of the branches shall be prescribed by the by-laws of the Reserve Association.

Functions of the Local Associations

Any member of a local association may apply to that local association for a guaranty of the commercial paper which it desires to rediscount at the branch of the Reserve Association in its district. Any such bank receiving a guaranty from a local association shall pay a commission to the local association, to be fixed from time to time by the board of directors of that local association. The guaranty of the members of the local association, in the event of loss, shall be met by the members of the local association in the proportion to the ratio which their capital and surplus bears to the aggregate capital and surplus of the local association; and the commission received for such guaranty, after the payment of losses and expenses, shall be distributed among the several banks of the local association in the same proportion. A local association shall have authority to require additional security from any bank offering paper for guaranty, or may decline to grant the application.

The total amount of guaranties by a local association to the Reserve Association shall not at any time exceed the aggregate capital and surplus of the banks forming the guaranteeing association.

Functions of the Reserve Association

All of the privileges and advantages of the Reserve Association shall be equitably extended to every national bank of any of the classes herein defined who shall subscribe to its proportion of the stock of the Reserve Association and shall otherwise conform to the requirements of this act.

The government of the United States and those national banks owning stock in the Reserve Association shall be the sole depositors in the Reserve Association. All domestic transactions of the Reserve Association shall be confined to the government and the subscribing banks, with the exception of

the purchase or sale of government or state securities, or securities of foreign governments, or of gold coin or bullion.

The government of the United States shall deposit its cash balance with the Reserve Association, and thereafter all receipts of the government shall be deposited with the Reserve Association or (when necessary) with such national banks as the government may designate for that purpose in cities where there is no branch of the Reserve Association. All disbursements by the government shall be made through the Reserve Association.

The Reserve Association shall pay no interest on deposits.

The Reserve Association may rediscount notes and bills of exchange arising out of commercial transactions, for and with the indorsement of any bank having a deposit with it. Such notes and bills must have a maturity of not more than twenty-eight days, and must have been made at least thirty days prior to the date of rediscount. The amount so rediscounted shall in no case exceed the capital of the bank applying for the rediscount. The aggregate of such notes and bills bearing the signature or indorsement of any one person, company, corporation, or firm, rediscounted for any one bank, shall at no time exceed 10 per cent of the capital and surplus of said bank.

The Reserve Association may also rediscount for any depositing bank, notes and bills of exchange arising out of commercial transactions, having more than twenty-eight days but not exceeding four months to run, but in such cases the paper must be guaranteed by the local association of which the bank asking for the rediscount is a member.

Whenever, in the opinion of the governor of the Reserve Association, the public interests so require, such opinion to be concurred in by the executive committee of the Reserve Association and to have the definite approval of the Secretary of the Treasury, the Reserve Association may discount the direct obligation of a depositing bank, indorsed by its local association,

provided that the indorsement of the local association shall be fully secured by the pledge and deposit with it of satisfactory securities, which shall be held by the local association for account of the Reserve Association; but in no such case shall the amount loaned by the Reserve Association exceed two-thirds of the actual value of the securities so pledged.

The rate of discount of the Reserve Association, which shall be uniform throughout the United States, shall be fixed from time to time by the executive committee and duly published.

The Reserve Association may, whenever its own condition and the general financial conditions warrant such investment, purchase to a limited amount from a depositing bank acceptances of banks or houses of unquestioned financial responsibility. Such acceptances must arise from commercial transactions and have a maturity not exceeding ninety days, and must be of a character generally known in the market as prime bills. Such acceptances shall also bear the indorsement of the depositing bank selling the same, which indorsement must be other than that of the acceptor.

The Reserve Association may invest in United States bonds and in short-term obligations — that is, obligations having not more than one year to run — of the United States, or of any state, or of certain foreign governments to be named in the act.

The Reserve Association shall have power at home and abroad to deal in gold coin or bullion, to grant loans thereon, and to contract for loans of gold coin or bullion, giving, when necessary, acceptable security for their repayment.

The Reserve Association shall have power to purchase from its depositors and to sell, with or without its indorsement, checks or bills of exchange payable in England, France, or Germany, and in such other foreign countries as the board of the Reserve Association may decide. These bills of exchange must arise from commercial transactions and be of a maturity not exceeding ninety days, and shall bear the signatures of at least three

responsible parties, of which the last one shall be that of a depositing bank.

The Reserve Association shall have power to open and maintain banking accounts in foreign countries and to establish agencies in foreign countries, for the purpose of purchasing, selling, and collecting foreign bills of exchange; and it shall have authority to buy and sell, through such agencies, prime foreign bills of exchange arising from commercial transactions, running for a period not exceeding ninety days, and bearing the signatures of two or more responsible parties.

Domestic Exchanges

It shall be the duty of the Reserve Association or any of its branches, upon request, to transfer any part of the deposit balance of any national bank having an account with it, to the credit of any other bank having an account with the Reserve Association. If a deposit balance is transferred from the books of one branch of the Reserve Association to the books of another branch, it may be done by mail or telegraph upon terms to be fixed from time to time by the executive committee.

Functions of National Banks

In addition to the rights now conferred by law, national banks shall be authorized to accept commercial paper drawn upon them, having not more than ninety days to run, properly secured and arising out of commercial transactions. The amount of such acceptances shall not exceed one-half the capital and surplus of the accepting bank.

National banks shall not have authority to establish branches except in the city or town in which they are located.

The organization of banks to conduct business in foreign countries shall be authorized. The stock of such banks may be held by national banks. The bank so organized may have an office in the United States, but shall not compete with national

banks for domestic business not necessarily related to the business being done in foreign countries.

There shall be established a new class of national banks, to be known by a specifically designated name. Such banks may have savings departments and may make properly secured loans on real estate, such loans to be restricted to a certain proportion of the aggregate time and savings deposits in the bank. The reserve requirement in such banks will be less against savings and time deposits than against demand deposits.

Another class of national banks shall be authorized, which shall be in effect national trust companies, to be designated by some appropriate name and to exercise all the functions and have all the privileges, including length of charter, which are given to trust companies by the laws of the various states. These national institutions shall be subject, like other national banks, to inspection and examination by the national government.

There shall be no change in the percentage of reserve required by law to be held against demand deposits by national banks, except as otherwise provided herein, but the deposit balance of any national bank in the Reserve Association shall be counted as a part of its legal reserve.

Reports to the Comptroller

The Reserve Association shall make a report, showing the principal items of its balance sheet, to the Comptroller of the Currency once a week. These reports shall be made public. In addition, full reports shall be made to the Comptroller of the Currency coincident with the five reports called for each year from the national banks.

All reports of national-bank examiners in regard to the condition of national banks shall hereafter be made in duplicate, and one copy shall be filed with the Reserve Association for the confidential use of its executive officers.

National banks of all classes shall hereafter make a weekly report to the Comptroller of the Currency, showing the principal items of their balance sheets, such reports to be available for the use of the executive officers of the Reserve Association.

Note Issues

There is hereafter to be no further issue, beyond the amount now outstanding, of bank notes by national banks. National banks may, if they choose, maintain their present note issue, but whenever a bank retires the whole or any part of its existing issue it will permanently surrender its right to reissue the notes so retired.

The Reserve Association must, for a period of one year, offer to purchase at a price not less than par and accrued interest the 2 per cent bonds now held by national banks and deposited to secure their circulating notes. The Reserve Association shall take over these bonds with the existing currency privilege attached and assume responsibility for the redemption (upon presentation) of outstanding notes secured thereby. The Reserve Association shall issue, on the terms herein provided, its own notes as fast as the outstanding notes secured by such bonds so held shall be presented for redemption, it being the policy of the United States to retire as rapidly as possible, consistent with the public interests, bond-secured circulation and to substitute therefor notes of the Reserve Association of a character and secured and redeemed in the manner provided for in this act.

The Reserve Association agrees to hold, for a period of not less than ten years, the bonds so purchased, or any government security which may be exchanged for them by refunding or otherwise. .The Reserve Association, however, shall have the right, with the approval of the Secretary of the Treasury, after two years to dispose annually of $50,000,000 of the bonds held

by it to secure circulation. The government reserves the right at all times to purchase at par from the Reserve Association, through the trustees of the postal savings bank or otherwise, any or all of such bonds so held.

If the government should adopt the policy of issuing securities at a higher rate of interest than 2 per cent, the Reserve Association shall have the right to exchange at par the government bonds which it may have acquired from the national banks, previously held by them to secure circulation, for any bonds bearing interest at a rate not exceeding 3 per cent; but in that event the amount of annual taxes to be paid on notes based upon such new securities shall be as much greater as the interest rate of the new securities shall exceed 2 per cent.

To illustrate: If the government should decide hereafter to issue a 2½ per cent bond, the rate of taxation on currency issued by the Reserve Association thereon would be 1 per cent, instead of one-half of 1 per cent, as on the existing twos, and upon a 3 per cent bond the rate of taxation would be 1½ per cent.

In addition to the authority to issue notes to replace any national-bank notes outstanding at the time of the organization of the Reserve Association, it shall have the right to issue additional circulating notes as follows: The whole or any part of the first $100,000,000 of such additional notes shall pay to the government an annual tax of 3 per cent; above $100,000,000 and not more than $200,000,000 may be issued at an annual tax of 4 per cent; above $200,000,000 and not more than $300,000,000 may be issued at an annual tax of 5 per cent; all above $300,000,000 shall pay an annual tax of 6 per cent.

All note issues of the Reserve Association must be covered to the extent of at least one-third by gold or other lawful money, and the remaining portion by bonds of the United States or bankable commercial paper as herein defined, or both. (It should be provided either that the Reserve Association may also hold in its reserve foreign coin, or that the Treasury will

issue gold certificates against foreign coin.) The notes are to constitute a first lien upon all the assets of the Reserve Association, and adequate provision must be made for their immediate redemption in lawful money on presentation at the head office of the Reserve Association or any of its branches.

The notes of the Reserve Association shall be received at par in payment of all taxes, excises, and other dues to the United States, and for all salaries and other debts and demands owing by the United States to individuals, corporations, or associations, except obligations of the government which are by their terms specifically payable in gold, and for all debts due from or by one national bank to another, and for all obligations due to a national bank.

The Reserve Association shall at once, upon application and without charge for transportation, forward its circulating notes to any depositing bank against its credit balance.

The currency committee of the American Bankers' Association has examined the Aldrich plan and has recommended some modifications of it. These comprise, among other suggestions, the appointment of the governor and two deputy governors of the Reserve Association by the board of directors instead of by the President of the United States, and the preparation and enactment of some definite plan for refunding the government's 2 per cent bonds now pledged against national-bank circulation, before the central organization shall take them over from the banks.

A subcommittee of the currency committee, to whom was referred the subject of enabling state banks, trust companies, and savings banks to share in the benefits of the Aldrich plan, has made a report embracing the following recommendations:

"That a bank or a savings bank which is incorporated under the laws of any state, in accordance with the requirements of which it has been examined and has published statements of

its condition, or, in the absence of such requirements of state laws, upon approval of the executive committee of the National Reserve Association, may subscribe to the capital stock of the National Reserve Association in the same manner and under the same conditions as prescribed for national banks, and such subscribing bank shall become a member of a local association and have the same rights and privileges therein as if it were a national bank; provided,

"That it shall have a paid-in capital of not less than that required for a national bank in the same location.

"That it shall have and agree to maintain against its demand deposits a reserve of like character and proportion required of a national bank in the same location; provided, however, that deposits which it may have with a state bank, a savings bank, or a trust company, in a city designated in the National Banking Act as a reserve city or a central reserve city, whose paid-in capital is not less than the minimum amount required for a national bank in such city, and, in the case of a trust company, not less than that hereinafter specified for a trust company in such city, and which is a member of a local association, shall count as reserve in like manner and to the same extent as similar deposits of a national bank with national banks in such cities. Provided further that liabilities for deposits payable beyond thirty days, and for savings deposits subject to notice of sixty days or more shall not be subject to the reserve requirements provided for demand deposits.

"That it shall agree to submit to such examinations and comply with such requirements as may from time to time be prescribed by the National Reserve Association.

"That a trust company, which is incorporated under the laws of any state, in accordance with the requirements of which it has been examined and has published statements of its condition, or, in the absence of such requirements of state laws, upon approval of the executive committee of the National Reserve Association, may subscribe to the capital stock of the National Reserve

Association in the same manner and under the same conditions as prescribed for national banks, and such subscribing trust company shall become a member of a local association and have the same rights and privileges therein as if it were a national bank; provided,

"That a trust company shall have an unimpaired surplus of not less than 20 per cent of its capital, and, if located in a city of 25,000 inhabitants or less, shall have a paid-in capital of not less than $100,000, and in a larger city a proportionately greater capital up to $500,000 in a city of 500,000 inhabitants or more.

"That it shall have, and agree to maintain against its demand deposits, a reserve of like character and proportion required of a national bank in the same location; provided, however, that deposits which it may have with a state bank, a savings bank, or a trust company, in a city designated in the National Banking Act as a reserve city or a central reserve city, whose paid-in capital is not less than the minimum amount required for a national bank in such city, and, in the case of a trust company, not less than that heretofore specified for a trust company in such city, and which is a member of a local association, shall count as reserve in like manner and to the same extent as similar deposits of a national bank with national banks in such cities. Provided further that liabilities for deposits payable beyond thirty days, for savings deposits subject to notice of sixty days or more, and for moneys held in trust, which, under the conditions of the trust, are not made payable within thirty days, shall not be subject to the reserve requirements provided for demand deposits.

"That it shall agree to submit to such examinations and comply with such requirements as may from time to time be prescribed by the National Reserve Association.

"That a mutual savings bank which is incorporated under the laws of any state, in accordance with the requirements of which it has been examined, and has published statements of its condition, or, in the absence of such requirements of state laws, upon

approval of the executive committee of the National Reserve Association, may subscribe to an amount of capital stock of the National Reserve Association equal to 20 per cent of the surplus of such subscribing bank, and not less, subject to the same conditions of ownership under which such stock may be owned by a national bank, and such subscribing bank shall become a member of a local association and have the same rights and privileges therein as if it were a national bank; provided,

"That a mutual savings bank shall have an unimpaired surplus of not less than the amount which would be required for the capital of a national bank in the same location.

"That it shall have and agree to maintain against its demand deposits a reserve of like character and proportion required of a national bank in the same location; provided, however, that deposits which it may have with a state bank, a savings bank, or a trust company in a city designated in the National Banking Act as a reserve city or a central reserve city, whose paid-in capital is not less than the minimum amount required for a national bank in such city, and, in the case of a trust company, not less than that heretofore specified for a trust company in such city, and which is a member of a local association, shall count as reserve in like manner, and to the same extent as similar deposits of a national bank with national banks in such cities. Provided further that liabilities for deposits payable beyond thirty days, and for savings deposits subject to notice of sixty days or more, shall not be subject to the reserve requirements provided for demand deposits.

"That it shall agree to submit to such examinations and comply with such requirements as may from time to time be prescribed by the National Reserve Association.

"That as its surplus increases or diminishes, it shall, upon request of the executive committee of the National Reserve Association, proportionately increase or decrease its holdings of capital stock of the National Reserve Association."

APPENDIX C

GUARANTEEING BANK DEPOSITS

In February, 1908, the state legislature of Oklahoma passed a law to guarantee the payment of deposits in banks which should become insolvent by embezzlement, bad management, or otherwise. It provided that each bank organized under the law of that state must contribute a sum equal to 1 per cent of its individual deposits, which should be collected and held by the state authorities for the purpose mentioned. Under this law the sum of $150,000 was collected, of which $110,000 was invested in state warrants and the remainder deposited in banks at 3 per cent interest.

The novelty of this proposal attracted the attention of politicians in the presidential campaign of that year, and led to the adoption of a clause in the Democratic national platform, which pledged the party to "legislation under which the national banks should be required to establish a guaranty fund for the prompt payment of the depositors of any insolvent national bank, under an equitable system which should be available to all state banking institutions wishing to use it."

National banks were allowed by the law of Oklahoma to participate in the operation of the deposit guaranty, if they desired to do so. The question as to whether the national banking law authorized such participation was referred to the Attorney-General of the United States (Mr. Bonaparte), who gave an opinion, July 28, 1908, that such participation would be an exercise of powers not granted by act of Congress, and hence unlawful.

The Columbia Bank and Trust Co., of Oklahoma City, having a capital of $200,000, failed September 28, 1909. Its deposit liabilities amounted to $2,900,000. It had cash and sight exchange to the amount of $1,134,000. The bank commissioner of the state took charge of it and began to pay the depositors as required by law. The funds in hand were not sufficient for this purpose, even with the whole of the deposit guaranty fund added. It became necessary to discriminate between depositors. Those whose claims were smallest were paid first. On October 30, 1909, $411,000 of deposits were still unpaid, although $503,000 of the guaranty fund had been used, of which $248,000 had been obtained by a special assessment on the banks. Thus the Oklahoma guaranty system proved a disappointment in a test case occurring less than two years after its enactment.

The total net collections for the guaranty fund up to January 1, 1911, were $818,740, and the amount remaining in it at that date was $333,787, the net loss to the fund being $484,953. An emergency assessment of 1 per cent was announced March 1, 1911. Thirty state banks soon thereafter entered the national system, four were merged with national banks, and sixty-five others made application to enter the national system. It is too early as yet to say whether the Oklahoma deposit guaranty system is a failure. Mr. Thornton Cooke, after an elaborate review of it, reaches the conclusion that the state cannot undertake to pay deposits in full as soon as a bank closes; that the insurance of bank deposits assists the growth of bad banks as well as good; and that under a state deposit-insurance system the risk that will be assumed on a single bank cannot be limited.[1]

Kansas, Nebraska, South Dakota, and Texas followed the example of Oklahoma by passing deposit-guaranty laws with

[1] See articles on "Insurance of Bank Deposits in the West," by Thornton Cooke, in the *Quarterly Journal of Economics*, November, 1909, and February, 1910.

some variations. Under the Kansas law the question of the participation of national banks was again referred to the Attorney-General of the United States (Mr. Wickersham), and was again decided in the negative.

The Nebraska law prohibits individuals from engaging in the banking business unless they do so through the agency of a corporation, and provides that every such corporation shall make contributions to a depositors' guaranty fund for the payment of the claims of depositors in any state bank which shall become insolvent. This act did not apply to national banks. It was immediately attacked by litigation in the United States Circuit Court for the district of Nebraska, by which tribunal it was pronounced unconstitutional and void, as in conflict with section 1 of the Fourteenth Amendment to the Constitution of the United States, which provides that no state shall deprive any person of life, liberty, or property, without due process of law.

The Kansas act was more lenient than those of Oklahoma and Nebraska. It did not compel any banks to enter into the deposit-guaranty scheme, but authorized a majority of the stockholders of any bank to decide the question of entering and to apply the money of a dissenting minority to the payment of the depositors of other banks which should become insolvent. The Kansas law also makes distinctions between different kinds of banks and different kinds of deposits which may be admitted to participation in the guaranty. Thus all banks are excluded which have not a surplus equal to 10 per cent of their capital, and all which have not been in operation for one year; also all deposits subject to check on which any interest is allowed, and all time deposits on which more than 3 per cent interest is allowed, all savings deposits exceeding $100, and all savings deposits of any amount if subject to withdrawal without notice; also all deposits which arise from the discount of commercial paper, and all that have any security other than that of the Bank Guaranty Law.

Notwithstanding these safeguards the law was immediately called in question in the United States District Court for Kansas. On the 24th of December, 1909, the court granted two injunctions restraining the State Bank Commissioner from enforcing the law. One case was that of Frank S. Larabee, a stockholder in the Exchange State Bank of Hutchinson. His contention was that a stockholder in a state bank can object and prevent the participation of his bank in the guaranty law. The court upheld this contention. The other case was that of the Abilene National Bank against the Bank Commissioner and State Treasurer on the ground that the state guaranty law is unconstitutional. The court granted a temporary injunction in this case, holding the law inoperative. January 3, 1911, the Supreme Court of the United States decided that the laws of Oklahoma, Nebraska, and Kansas for guaranteeing bank deposits were constitutional and valid.

The South Dakota law is not compulsory. Every bank entering the deposit-guaranty system must make an initial payment of one-tenth of 1 per cent on its deposits for the first three months and one-tenth of 1 per cent annually thereafter until the same is discontinued or changed by the state board of commissioners. Special assessments not exceeding four-tenths of 1 per cent in any one year may be made in cases of emergency.

Under the Texas law all incorporated banks, operating under the general banking law of the state, must make depositors secure either by a guaranty fund or by furnishing a guaranty bond, the latter to be executed by three approved individuals or by one approved surety corporation. The initial assessment for the guaranty fund is 1 per cent of deposits and one-fourth of 1 per cent annually thereafter till the fund equals $2,000,000.

From the economic point of view the deposit-guaranty law has little ground to stand upon. The New York Safety Fund system of 1829, which provided for the payment of all the debts

of failed banks by a common fund, broke down in practice in the first serious strain put upon it, and the state acknowledged its inadequacy by providing that thereafter the fund should be used only for the redemption of circulating notes. If the Oklahoma law had been in force before the panic of 1907, it would have failed in like manner. If the Oklahoma system had been embodied in the National Banking Act prior to 1907, it would have failed on a larger scale in that emergency.

The selection of a place in which to deposit one's money ought to require the exercise of care and discrimination on the part of the depositor. Any provision by the state, which saves him from the need of discriminating, puts good bankers and bad ones on the same level. It even gives the speculating banker an advantage by enabling him to tempt depositors by the offer of high rates of interest on deposits, and to make risky investments. The essential difference between the guaranty of deposits and that of circulating notes is that the depositor is an individual, who may exercise a choice, while the noteholders are the whole community, who have neither time nor ability to discriminate between the different kinds of currency afloat.

It is true that some depositors who have exercised ordinary intelligence in their choice of banks have made mistakes. This happens also to shareholders who have invested their money in bank stocks. The losses of depositors and those of shareholders in consequence of bank failures have been about equal in the aggregate during the forty-five years of the national banking system, — about $32,000,000 for each. No valid reason exists why the government should intervene to protect one class more than the other, seeing that the business relations entered into between them have been voluntarily assumed. Nor is there any reason why the government should take pains to secure the claims of depositors against bankers, rather than those of bankers against borrowers, or those of wage earners against employers. These considerations become more weighty when the government

seeks to accomplish this end with the money of persons who have had no agency in causing the bank failures.

The controversy over the deposit-guaranty laws has given birth to a method of protecting depositors by private insurance companies. This is a perfectly proper business, as legitimate as life, fire, marine, accident, or mortgage insurance. It has been held admissible for national banks by the Attorney-General of the United States, and as lawful by the courts in cases which have been litigated. The statistics of bank mortality are now ample for a computation of the risk assumed in such underwriting. It remains to be seen, however, whether the demand for it is sufficient to make the business profitable. From all points of view it is to be preferred to the deposit-guaranty laws of states.

APPENDIX D

THE FEDERAL RESERVE BILL

On June 26, 1913, a bill proposing radical changes in our banking and currency system was introduced in Congress by Representative Glass of Virginia and Senator Owen of Oklahoma, chairmen of the committees having charge of that subject in the two houses respectively. At the same time the announcement was made that it had the sanction of President Wilson, but that it was open to amendment like other measures before Congress. It was referred to the two committees; they proposed numerous amendments, some of which have been adopted, while others are still pending. The principal features of the bill, as first introduced, are these:

Federal Reserve Banks

It provides for the organization of "not less than twelve" federal reserve districts, in which there shall be established twelve federal reserve banks, to which national banks are required to subscribe the capital to the extent of 20 per cent of their own capital, one-half to be paid in cash, the other half to be subject to call. The minimum capital of any federal reserve bank shall be $5,000,000. Dividends of 5 per cent per annum on the stock so subscribed shall be paid if earned. All other profits shall go to the public treasury.

Each federal reserve bank shall exercise the banking powers of existing national banks and shall be managed by nine directors. Three of these shall be chosen by the stockholding banks from their own membership; three shall be chosen in like

manner to be representatives of general public interests (meaning thereby the commercial, agricultural, and industrial interests of their respective districts), but not to be officers or directors of any bank; and three shall be chosen by the federal reserve board at Washington city — one of the latter three to be designated by the federal board as chairman of the board of nine and as "federal reserve agent."

Federal Reserve Board

The federal reserve board is to consist of seven members. The Secretary of the Treasury, the Secretary of Agriculture, and the Comptroller of the Currency are to be ex officio members. The other four members, "one of whom shall be experienced in banking," are to be chosen by the President of the United States with the consent of the Senate. The Secretary of the Treasury is to be chairman of the board. The federal reserve board is to have power to require any federal reserve bank to rediscount the paper of any other federal reserve bank, and also to fix a minimum rate of interest.

Rediscounts; Deposits; Treasury Notes

Section 13 authorizes any federal reserve bank to receive deposits from any of its own stockholders and to rediscount for any member bank the commercial paper of such member, subject to certain conditions as to the nature of the security and the time of maturity thereof. Any federal reserve bank may establish branches in foreign countries, with the consent of the federal reserve board.

All moneys belonging to the general fund of the United States Treasury shall be deposited in the federal reserve banks, and the Secretary of the Treasury may at his discretion charge interest thereon at a rate to be fixed by himself. No federal reserve bank shall pay interest upon any deposits except those

of the United States. The Government of the United States and the banks depositing in the federal reserve banks shall be the only depositors in the federal reserve banks.

Section 17 authorizes an issue of federal reserve treasury notes not to exceed $500,000,000. Such notes shall purport on their faces to be the obligations of the United States, and shall be issued at the discretion of the federal reserve board and solely for the purpose of making advances to the federal reserve banks on the security of commercial paper rediscounted by them. They shall be redeemable in gold on demand at the Treasury Department in Washington or at any federal reserve bank. The amount of such notes so issued to any such bank shall become a first lien on all its assets.

Section 20 provides for the gradual retirement of the present bond-secured national bank notes and the refunding of the 2 per cent government bonds pledged as security for them into 3 per cent bonds payable after twenty years. It makes no such provision for the 2 per cent bonds held by private persons.

Bank Reserves

Section 21 provides that every national bank shall keep a credit balance, equal to 5 per cent of its total demand liabilities exclusive of circulating notes, as a deposit in the federal reserve bank of its district. This is a part of its legal reserve, and this part shall never fall below 5 per cent. Country banks, outside of reserve cities, are required to maintain a total reserve of 15 per cent; banks in reserve cities, 20 per cent.

State banks and trust companies having a capital not less than that required for national banks under existing law may be admitted to the same privileges as national banks.

Section 23 provides that every federal reserve bank shall at all times have on hand in its own vaults, in gold or lawful money, a sum equal to not less than $33\frac{1}{3}$ per cent of its demand liabilities.

The federal reserve treasury notes are not legal tender.

Section 27 permits national banks not in reserve cities to make mortgage loans, for not more than nine months, on improved farm lands.

Comment

The foregoing bill compels each existing national bank to invest one-fifth of its capital, and place 5 per cent of its deposits, in a new kind of bank, where the profits cannot exceed 5 per cent and may be less. The new banks are to be controlled by a board of seven persons at Washington city, only one of whom need be a banker or acquainted with banking science, and none of the appointees are to be selected by the bankers whose property they control. In other words, the control of bank property is separated from the ownership, contrary to all Anglo-Saxon precedents and custom. This is the system of the Imperial Bank of Germany, with the difference that the latter is less liable to change of personnel of the bank directorate. That membership of the federal reserve board would eventually become a part of the spoils of politics, however free from that taint it might be in the beginning, all our experience shows. On this subject Mr. James B. Forgan, of Chicago, justly remarks:

"Banking and politics are like oil and water, they do not mix. If the former is to be kept sound and good, it must be kept separate from the latter. The principles underlying sound banking are diametrically opposed to those which rightly or wrongly seem to control politics. In their fiduciary capacity, bankers, if they wish to succeed and be faithful to their trust, must constantly be on their guard against the influence of such virtues even as friendship and human sympathy, and they must officially eschew the insidious influence of reciprocal personal favors. Such influences seem to be of the essence of politics and to control political activities."

That the framers of this bill had for their chief purpose the

conservation and economical use of bank reserves is evident from the name which they have given to their measure. They have aimed to prevent the depletion of cash reserves in times of panic; that is, runs on banks by depositors and by some banks on others, leading to bank suspension, more or less complete. To this end they have provided twelve reservoirs for the collection of bank reserves, which is certainly better than twelve thousand. After the system goes in force there will be one reserve bank in each district to which the lesser banks of the district can look for help in an emergency. There is no certainty that the twelve will not make runs on each other.

The Currency Commission of the American Bankers Association, having been asked by a sub-committee of the Senate to express an opinion on this part of the bill, replied in the following terms, in which the writer of this book concurs:

"Three objections to the regional reserve associations occur to us:

"*First.* They will divide the cash reserves of the country into as many different ownerships as there are regional associations. No individual bank can now strengthen its cash reserves without at the same time and to the same extent depleting the reserve of some other bank; so with the regional reserve associations, no one of them will be able to strengthen its cash reserves without drawing them from and reducing to the same extent the reserve of one of the other associations.

"*Second.* In connection with the shipping of reserve money from one section of the country to another: Under one central reserve association with branches this could be accomplished without change of ownership of the money shipped, as it would belong to the one association irrespective of what branch had custody of it. In the case of independent regional reserve associations no such transfer of reserve money could be made from one region to another without a change in ownership. It would increase the reserve of the association that receives it and deplete

by a similar amount the reserve of the association that ships it. In times of financial stress when each regional reserve association would be husbanding its resources for the benefit of its own constituents, this might produce an undesirable and awkward situation, the interests of the various sections of the country being at variance. Such effect will be intensified in direct ratio to the number of regional reserve associations."

It is a grave objection to this bill that it makes a new issue of United States notes. Instead of retiring those already existing, and taking the government out of the banking business altogether, it proposes to issue federal reserve treasury notes to the possible limit of $500,000,000 against commercial paper secured in certain ways. Most people will look upon these notes as a new issue of greenbacks, and we shall presently have a demand for more notes to be issued directly to the holders of cotton, breadstuffs and other property in warehouses, as was demanded by the Populists twenty years ago. Such demands have already been made by influential members of Congress.

There is serious danger that the passage of this bill may put an end to the national banking system, without giving birth to any other system. The question would be put to every existing national bank, whether it would risk one-fifth of its capital and 5 per cent of its deposits in the new federal reserve scheme, or retire from the national system. Of course any future Congress may require that both the investment and the deposit be increased. The question, therefore, is whether the existing bank is likely to acquiesce in a future mastery over its entire resources, which its acquiescence now would imply. The banker will not be alone in deciding this question. Will depositors have confidence in the new style of banking here proposed? If not, they will silently draw out their money from the new-style banks and deposit it elsewhere.

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